

INVENTOR SEARCH

=> fil capl; d que nos l15

FILE 'CAPLUS' ENTERED AT 15:58:42 ON 19 OCT 2006

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FILE COVERS 1907 - 19 Oct 2006 VOL 145 ISS 17

FILE LAST UPDATED: 18 Oct 2006 (20061018/ED)

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'OBI' IS DEFAULT SEARCH FIELD FOR 'CAPLUS' FILE

L13 296 SEA FILE=CAPLUS ABB=ON NISHITANI Y?/AU
L14 417 SEA FILE=CAPLUS ABB=ON YAMANO Y?/AU
L15 1 SEA FILE=CAPLUS ABB=ON L13 AND L14

=> d ibib ed abs hitstr l15

L15 ANSWER 1 OF 1 CAPLUS COPYRIGHT 2006 ACS on STN
ACCESSION NUMBER: 2003:757715 CAPLUS Full-text
DOCUMENT NUMBER: 139:261088
TITLE: Preparation of broad-spectrum cephem compounds
INVENTOR(S): Nishitani, Yasuhiro; Yamano, Yoshinori
PATENT ASSIGNEE(S): Shionogi & Co., Ltd., Japan
SOURCE: PCT Int. Appl., 209 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

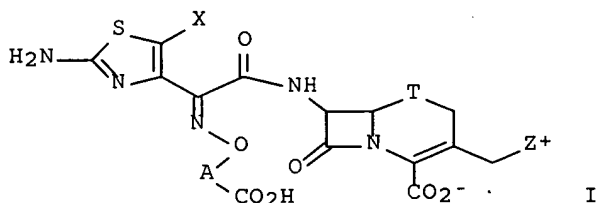
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WO 2003078440	A1	20030925	WO 2003-JP3249	20030318
W: AE, AG, AL, AM, AN, AT, AU, AZ , BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, IL, IN, IS, JP, KE, KG, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NI, NO, NZ, OM, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY,				

read 1 of 3
and
search 2 of 3

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KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES,
FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR,
BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

CA 2479354	AA	20030925	CA 2003-2479354	20030318
AU 2003221080	A1	20030929	AU 2003-221080	20030318
EP 1489084	A1	20041222	EP 2003-712748	20030318
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, HU, SK				
BR 2003008492	A	20050503	BR 2003-8492	20030318
US 2005153950	A1	20050714	US 2003-507502	20030318
CN 1653072	A	20050810	CN 2003-810969	20030318
PRIORITY APPLN. INFO.:			JP 2002-73526	A 20020318
			WO 2003-JP3249	W 20030318
OTHER SOURCE(S): MARPAT 139:261088				
ED Entered STN: 26 Sep 2003				
GI				



AB Cephem compds. I (T is S, SO, or O; X is halogeno, CN, carbamoyl which may be substituted with lower alkyl, lower alkyl, lower alkoxy, or lower alkylthio; A is substituted lower alkylene (wherein the substituent is optionally substituted mono-lower alkyl, optionally substituted lower alkylidene, or optionally substituted lower alkylene); and Z⁺ is an optionally substituted nitrogenous heterocyclic group having a cationic group), their ester, protected 7-aminothiazole, or pharmaceutically acceptable salts or solvates, are prepared I [X = Me, A = Me₂C, T = S, Z = 1-(3-methylaminopropyl)-1H-imidazo[4,5-b]pyridinium-4-yl-] was prepared and showed antibacterial activities superior to that of ceftazidime.

REFERENCE COUNT: 18 THERE ARE 18 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

STRUCTURE SEARCH

=> fil reg; d stat que l10
FILE 'REGISTRY' ENTERED AT 15:59:14 ON 19 OCT 2006
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STRUCTURE FILE UPDATES: 18 OCT 2006 HIGHEST RN 910777-14-9
DICTIONARY FILE UPDATES: 18 OCT 2006 HIGHEST RN 910777-14-9

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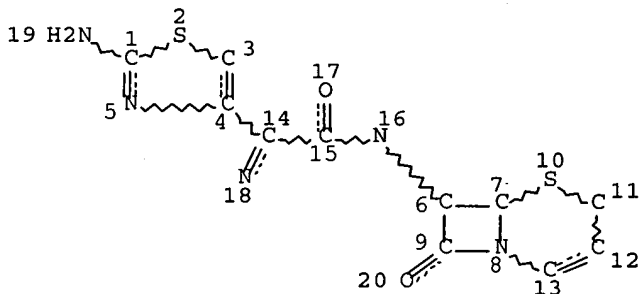
TSCA INFORMATION NOW CURRENT THROUGH June 30, 2006

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REGISTRY includes numerically searchable data for experimental and
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L1 STR



NODE ATTRIBUTES:

DEFAULT MLEVEL IS ATOM

DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:

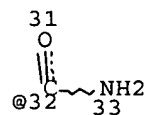
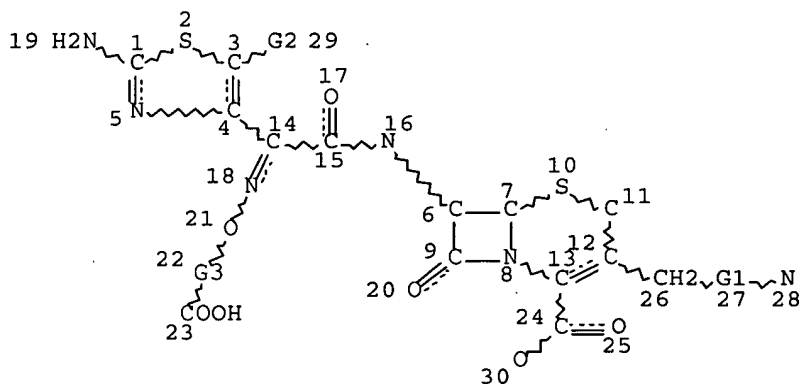
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NUMBER OF NODES IS 20

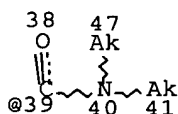
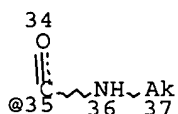
STEREO ATTRIBUTES: NONE

L3 19554 SEA FILE=REGISTRY SSS FUL L1

L6 STR



Ak @46



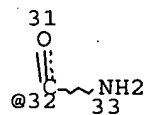
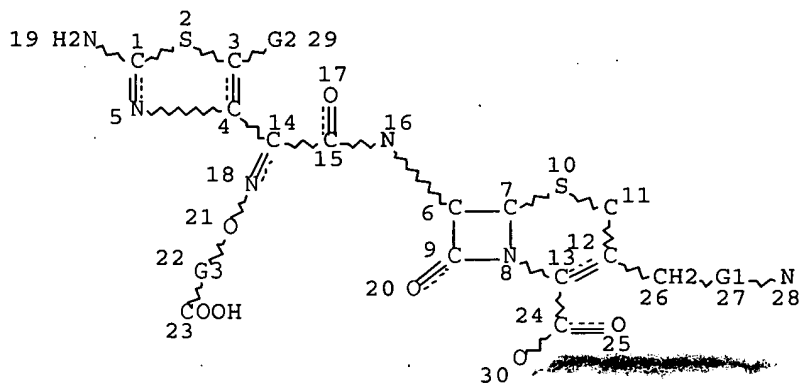
O~Ak
@42 43

S~Ak
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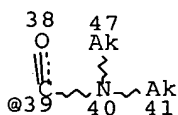
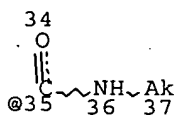
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VAR G2=X/CN/32/35/39/42/44/46
REP G3=(1-6) C
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CONNECT IS E1 RC AT 37
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CONNECT IS E1 RC AT 43
CONNECT IS E1 RC AT 45
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CONNECT IS E1 RC AT 47
DEFAULT MLEVEL IS ATOM
DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:
RING(S) ARE ISOLATED OR EMBEDDED
NUMBER OF NODES IS 47

STEREO ATTRIBUTES: NONE
L8 STR



Ak @46



O~Ak
@42 43

S~Ak
@44 45

REP G1=(0-6) A
VAR G2=X/CN/32/35/39/42/44/46
REP G3=(1-6) CH2
NODE ATTRIBUTES:
NSPEC IS R AT 28
CONNECT IS E1 RC AT 37
CONNECT IS E1 RC AT 41
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CONNECT IS E1 RC AT 45
CONNECT IS E1 RC AT 46
CONNECT IS E1 RC AT 47
DEFAULT MLEVEL IS ATOM
DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:
RING(S) ARE ISOLATED OR EMBEDDED
NUMBER OF NODES IS 47

STEREO ATTRIBUTES: NONE
L10 194 SEA FILE=REGISTRY SUB=L3 SSS FUL (L6 NOT L8)

100.0% PROCESSED 5029 ITERATIONS 194 ANSWERS
SEARCH TIME: 00.00.01

=> fil capl; d que nos l11
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FILE COVERS 1907 - 19 Oct 2006 VOL 145 ISS 17
FILE LAST UPDATED: 18 Oct 2006 (20061018/ED)

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'OBI' IS DEFAULT SEARCH FIELD FOR 'CAPLUS' FILE

L1 STR
L3 19554 SEA FILE=REGISTRY SSS FUL L1
L6 STR
L8 STR
L10 194 SEA FILE=REGISTRY SUB=L3 SSS FUL (L6 NOT L8)

=> s l11 not l15

L17 6 L11 NOT L15

=> d ibib ed abs hitstr 1-6

L17 ANSWER 1 OF 6 CAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 2006:787716 CAPLUS Full-text

DOCUMENT NUMBER: 145:210796

TITLE: Process for preparation of N-(4-pyridyl)ethylenediamine derivatives

INVENTOR(S): Shimizu, Sumio; Hakogi, Toshikazu; Tanimoto, Norihiko

PATENT ASSIGNEE(S): Shionogi and Co., Ltd., Japan

SOURCE: Jpn. Kokai Tokkyo Koho, 28pp.

CODEN: JKXXAF

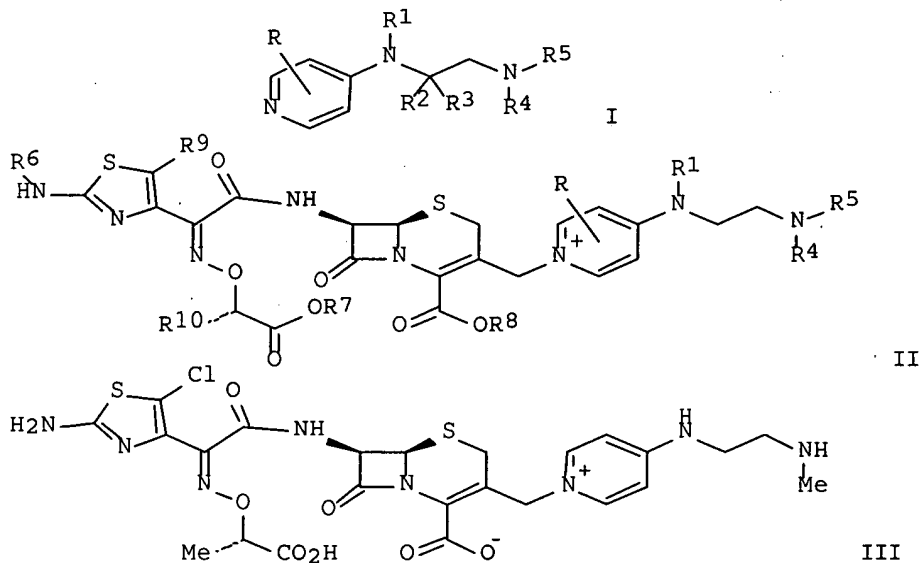
DOCUMENT TYPE: Patent

LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 2006206529	A2	20060810	JP 2005-22598	20050131
PRIORITY APPLN. INFO.:			JP 2005-22598	20050131
OTHER SOURCE(S):			MARPAT 145:210796	
ED Entered STN: 10 Aug 2006				
GI				



AB This invention pertains to a method for producing N-(4-pyridyl)ethylenediamine derivs. with general formula of I and II•X- [wherein R = H, alkyl, or (un)substituted aralkyl; R¹ = H, alkoxycarbonyl, etc.; R² and R³ = H or =O; R⁴ = H, alkoxycarbonyl, etc.; R⁵ = alkyl, alkoxycarbonyl, etc.;

R6-R8 = independently a protecting group; R9 = H, alkyl, or halo; R10 = alkyl; X = a leaving group] or salts thereof. For example, the compound III was prepared in a multi-step synthesis in good yield.

IT 604001-47-0P

RL: IMF (Industrial manufacture); SPN (Synthetic preparation); PREP (Preparation)

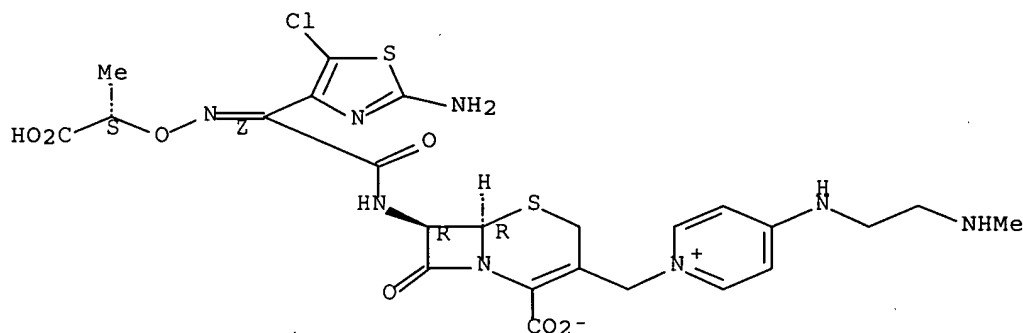
(preparation of N-(4-pyridyl)ethylenediamine derivs.)

RN 604001-47-0 CAPLUS

CN Pyridinium, 1-[[[(6R,7R)-7-[[[(2Z)-(2-amino-5-chloro-4-thiazolyl)[[(1S)-1-carboxyethoxy]imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-4-[[2-(methylamino)ethyl]amino]-, inner salt (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.



L17 ANSWER 2 OF 6 CAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 2006:348558 CAPLUS Full-text

DOCUMENT NUMBER: 145:7928

TITLE: Preparation of cephem compounds for use in antibacterial pharmaceutical compositions

INVENTOR(S): Okuda, Shinya; Murano, Kenji; Itoh, Kenji; Misumi, Keiji; Satoh, Kenji; Kawabata, Kohji; Toda, Ayako; Inoue, Satoshi; Ohki, Hidenori; Yamanaka, Toshio

PATENT ASSIGNEE(S): Wakunaga Pharmaceutical Co., Ltd., Japan; Astellas Pharma, Inc.

SOURCE: Aust. Pat. Appl., 96 pp.

CODEN: AUXXCM

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

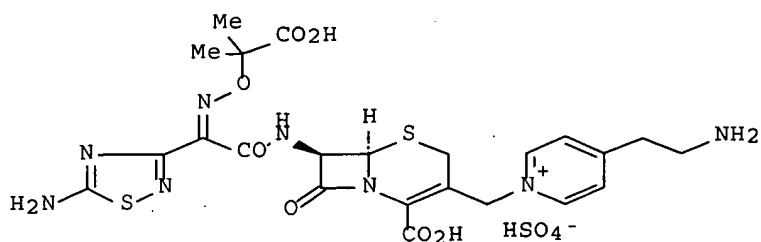
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
AU 2005202802	A1	20060112	AU 2005-202802	20050627
PRIORITY APPLN. INFO.:			AU 2004-903529	A 20040628
			AU 2004-903705	A 20040706

OTHER SOURCE(S): MARPAT 145:7928

ED Entered STN: 17 Apr 2006

GI



I

AB Cephem derivs., such as I, were prepared starting from 4-methoxybenzyl 7 β -amino-3-(chloromethyl)-3-cephem-4-carboxylate hydrochloride for therapeutic use in the treatment of bacterial infections. The prepared cepheps were assayed for antibacterial activity against *Pseudomonas aeruginosa* FP 1456.

IT 887775-87-3P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of cephem compds. for use in antibacterial pharmaceutical compns.)

RN 887775-87-3 CAPLUS

CN 1H-Pyrazolium, 5-amino-2-[[[(6R,7R)-7-[[[(2Z)-(2-amino-5-chloro-4-thiazolyl) [[[(1S)-1-carboxyethoxy]imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-4-[(3-amino-1-oxopropyl)amino]-1-methyl-, sulfate (1:1) (9CI) (CA INDEX NAME)

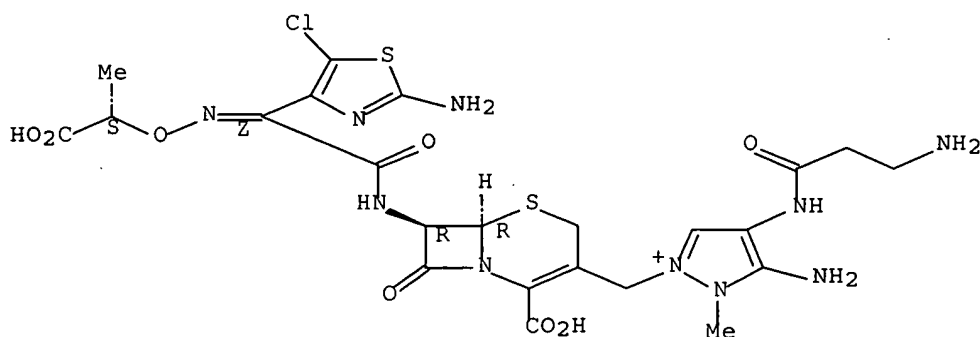
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CRN 887775-86-2

CMF C23 H28 Cl N10 O8 S2

Absolute stereochemistry.

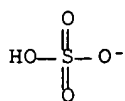
Double bond geometry as shown.



CM 2

CRN 14996-02-2

CMF H O4 S



L17 ANSWER 3 OF 6 CAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 2005:58212 CAPLUS Full-text

DOCUMENT NUMBER: 142:134930

TITLE: Preparation of cross-linked glycopeptide-cephalosporin antibiotics

INVENTOR(S): Fatheree, Paul R.; Linsell, Martin S.; Marquess, Daniel; Trapp, Sean G.; Moran, Edmund J.; Aggen, James B.

PATENT ASSIGNEE(S): Theravance, Inc., USA

SOURCE: PCT Int. Appl., 53 pp.

CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2005005436	A2	20050120	WO 2004-US22319	20040709
WO 2005005436	A3	20050310		
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US 2005026818	A1	20050203	US 2004-888849	20040709
US 7067482	B2	20060627		
EP 1644382	A2	20060412	EP 2004-778030	20040709
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, CY, TR, BG, CZ, EE, HU, PL, SK				
US 2006189517	A1	20060824	US 2006-405331	20060417
PRIORITY APPLN. INFO.:			US 2003-486484P	P 20030711
			US 2004-888849	A1 20040709
			WO 2004-US22319	W 20040709

OTHER SOURCE(S): MARPAT 142:134930

ED Entered STN: 21 Jan 2005

GI

* STRUCTURE DIAGRAM TOO LARGE FOR DISPLAY - AVAILABLE VIA OFFLINE PRINT *

AB The invention provides cross-linked glycopeptide-cephalosporin compds. I [R is fragment II; X1, X2 are independently H or Cl; W is N or CCl; R1, R2 are independently H or alkyl; R3 is alkyl, alkoxy, halo, alkylthio, alkylsulfinyl,

alkylsulfonyl or alkoxy sulfonyl which may be substituted by CO₂H or F; one of R₄ and R₅ is H and the other is OH; R₆, R₇ are independently H or Me; R₈ is H or 4-amino-3-hydroxy-2,4-dimethyltetrahydro-2H-pyran-2-yl; R₉ is H or (cyclo)alkyl which may be substituted by CO₂H or 1-3 F atoms; n is 0-3; X is -Ra(NR_bCO-R_c)₀₋₂(CONR_{b'}CO-R_{c'})₀₋₂-, where R_a is -Y-R''; R'' contains at most 20 non-hydrogen atoms and is defined as (un)substituted alkylene, alkenylene, alkynylene, cycloalkylene, arylene, heteroarylene or heterocyclyl; Y links R to the pyridinium ring at a meta or para position and is a direct bond, NR', O, S, CO, NR'CO or CONR' (R' is H or alkyl), precluding direct bonds between heteroatoms in Y and R; R_b, R_{b'} are independently H, alkyl, alkenyl or alkynyl; R_c is independently -Y'-R'''-Y'-, where each Y' is independently a direct bond, O or NR', precluding direct bonds between heteroatoms in Y' and R; R_{c'} is a group defined by R''' and their pharmaceutically-acceptable salts which are useful as antibiotics. The invention also provides pharmaceutical compns., methods for treating bacterial infections in a mammal, and processes and intermediates useful for preparing such compds. Thus, vancomycin hydrochloride was treated with ethylenediamine/formaldehyde and pyridinium lactam II (W is CCl, X is 4-CH₂NH₂, n is 0, R₉ is Me) (prepared from an aminocephalosporonic ester) was amidated with adipic acid bis-HOAT ester. Coupling of the products afforded a glycopeptide-cephalosporin conjugate which showed MIC < 0.1 µg/mL for inhibition of methicillin-resistant and methicillin-susceptible S. aureus (vancomycin MIC = 2.0 and 1.0 µg/mL, resp.).

IT 827040-36-8P 827040-37-9P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of cross-linked glycopeptide-cephalosporin antibiotics)

RN 827040-36-8 CAPLUS

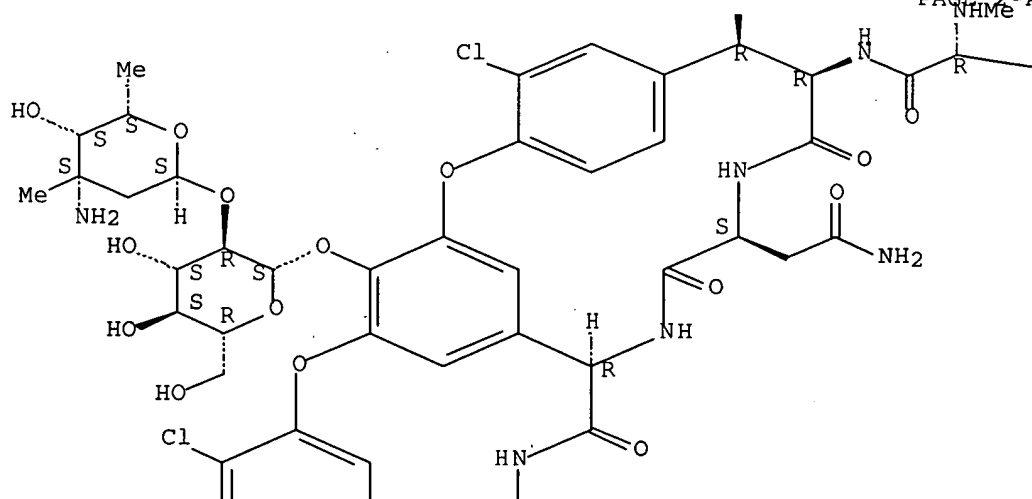
CN Vancomycin, 29-[[[2-[[6-[[[1-[[[(6R,7R)-7-[[[(2Z)-(2-amino-5-chloro-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]pyridinium-4-yl]methyl]amino]-1,6-dioxohexyl]amino]ethyl]amino]methyl]-, inner salt (9CI) (CA INDEX NAME)

Absolute stereochemistry.

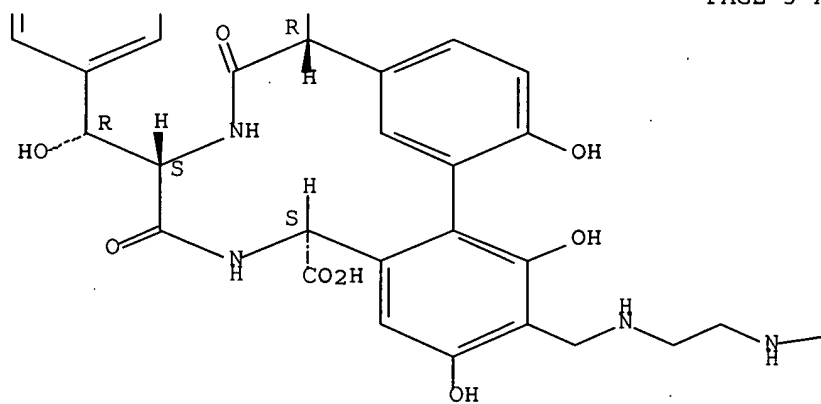
Double bond geometry as shown.

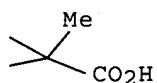
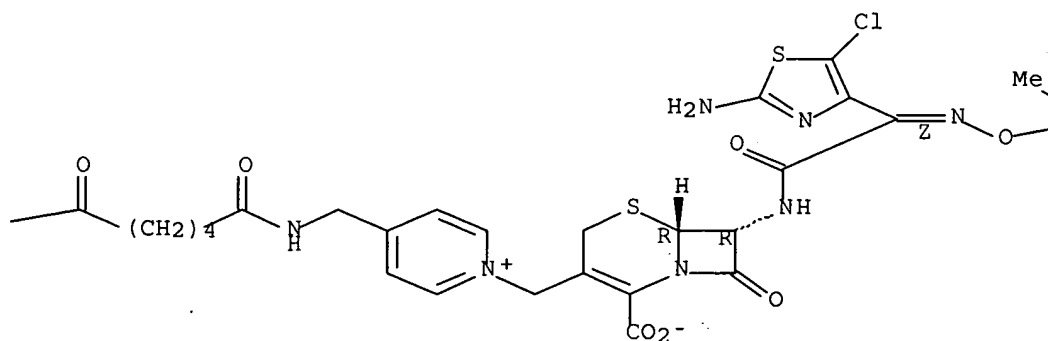
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OH



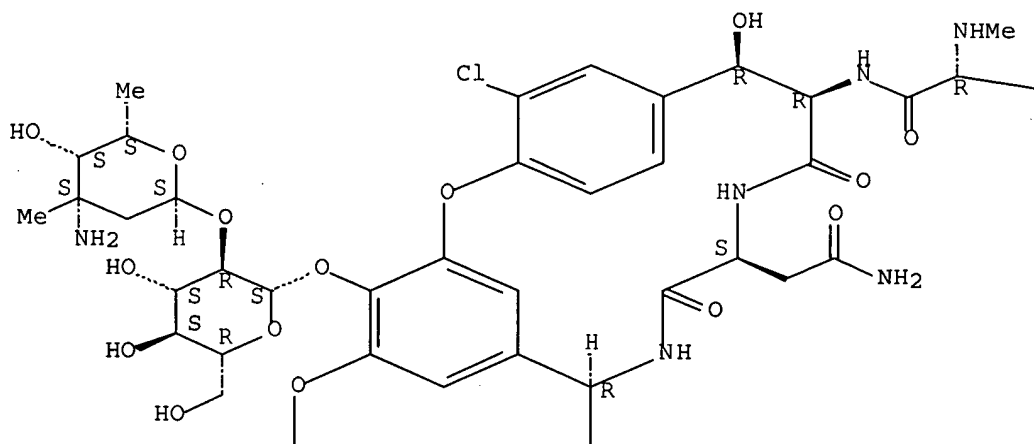
— Bu-i



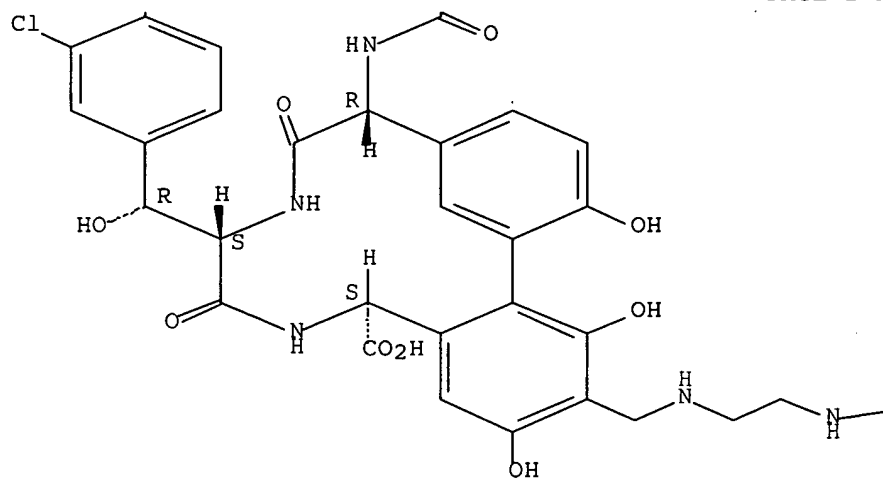


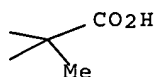
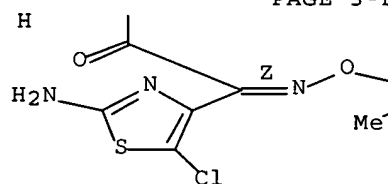
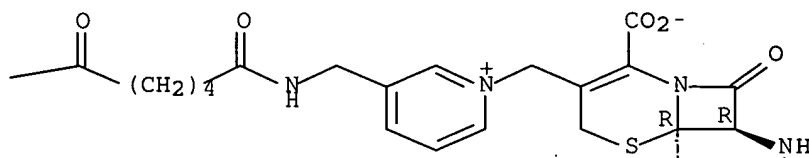
RN 827040-37-9 CAPLUS
 CN Vancomycin, 29-[[[2-[[4-[[[1-[[[(6R,7R)-7-[[[(2Z)-(2-amino-5-chloro-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]pyridinium-3-yl]methyl]amino]-1,4-dioxobutyl]amino]ethyl]amino]methyl]-, inner salt (9CI) (CA INDEX NAME)

Absolute stereochemistry.
 Double bond geometry as shown.



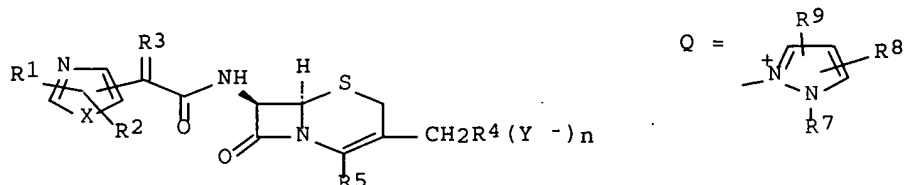
— Bu-i





L17 ANSWER 4 OF 6 CAPLUS COPYRIGHT 2006 ACS on STN
 ACCESSION NUMBER: 1997:740235 CAPLUS Full-text
 DOCUMENT NUMBER: 128:13170
 TITLE: 3-pyrazolomethylcephem compounds as antimicrobial agents
 INVENTOR(S): Kawabata, Kohji; Okuda, Shinya; Kishi, Kohei; Eikyu, Yoshiteru; Takasugi, Hisashi
 PATENT ASSIGNEE(S): Fujisawa Pharmaceutical Co., Ltd., Japan
 SOURCE: PCT Int. Appl., 99 pp.
 CODEN: PIXXD2
 DOCUMENT TYPE: Patent
 LANGUAGE: English
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9741128	A1	19971106	WO 1997-JP1416	19970424
W: AU, CA, CN, JP, KR, US				
RW: AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
AU 9724055	A1	19971119	AU 1997-24055	19970424
PRIORITY APPLN. INFO.:			AU 1996-9555	A 19960430
			WO 1997-JP1416	W 19970424
OTHER SOURCE(S):		MARPAT 128:13170		
ED	Entered STN: 24 Nov 1997			
GI				



AB Synthesis of cepheims (I) [R1 = (un)substituted amino; R2 = halo, alkyl, (un)substituted alkylthio; R3 = =NOR6; R4 = Q; R5 = CO2-, (un)substituted carboxy; R6 = H, (un)substituted alkyl, (un)substituted alkenyl, (un)substituted alkynyl; R7 = OH, (un)substituted O, (un)substituted alkyl; R8 = (un)substituted amino; R9 = H, alkyl, heterocycle; X = S, O; Y = anion; n = 0, 1] and suitable salts is described. Thus, I (R1 = NH2, R2 = Cl, R3 = =NOCH2CN, R4 = Q, R5 = CO2H, R7 = CH2CH2OH, R8 = =NH, R9 = H, X = S) (II) is prepared by the condensation of (Z)-2-cyanomethoxyimino-2-(2-amino-5-chlorothiazol-4-yl)acetic acid with 7β-amino-3-[5-imino-1-(2-hydroxyethyl)-2-pyrazolyl]-methyl-3-cephem-4-carboxylic acid. II shows an MIC of 6.25 ug/mL against *S. aureus* 3004 when incubated at 37°C for 20 h.

IT 199002-63-6P 199002-68-1P

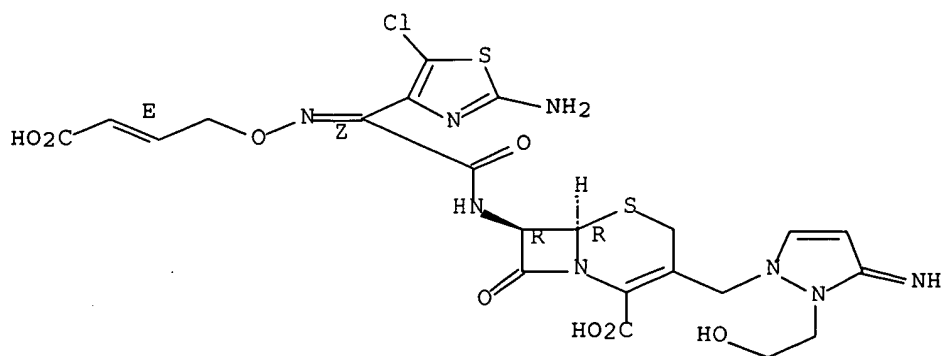
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)
(preparation of 3-pyrazoliomethylcephem compds. as antimicrobial agents)

RN 199002-63-6 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-5-chloro-4-thiazolyl)[[(3-carboxy-2-propenyl)oxy]imino]acetyl]amino]-3-[[2,3-dihydro-2-(2-hydroxyethyl)-3-imino-1H-pyrazol-1-yl]methyl]-8-oxo-, [6R-[6α,7β[Z(E)]]]- (9CI)
(CA INDEX NAME)

Absolute stereochemistry.

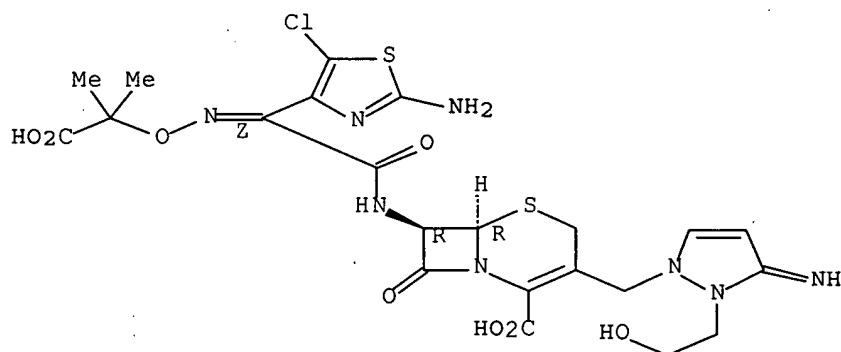
Double bond geometry as shown.



RN 199002-68-1 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-5-chloro-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-3-[[2,3-dihydro-2-(2-hydroxyethyl)-3-imino-1H-pyrazol-1-yl]methyl]-8-oxo-, [6R-[6 α ,7 β (Z)]]- (9CI)
(CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L17 ANSWER 5 OF 6 CAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 1992:469622 CAPLUS Full-text

DOCUMENT NUMBER: 117:69622

TITLE: Studies on condensed-heterocyclic azolium
cephalosporins. III. Synthesis and antibacterial
activity of 7 β -[2-(2-amino-5-substituted-thiazol-
4-yl)-2(Z)-alkoxyiminoacetamido]-3-(condensed-
heterocyclic azolium)methyl-3-cephem-4-carboxylates
AUTHOR(S): Nishimura, Tatsuo; Yoshimura, Yoshinobu; Miyake, Akio
CORPORATE SOURCE: Chem. Res. Lab., Takeda Chem. Ind., Ltd., Osaka, 532,
Japan

SOURCE: Journal of Antibiotics (1992), 45(4), 485-99

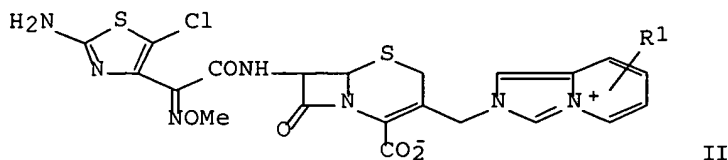
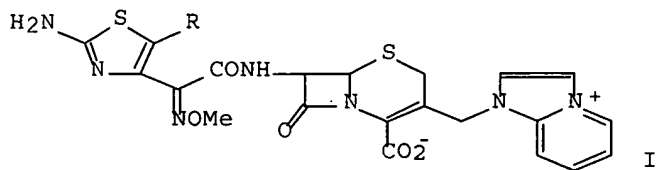
CODEN: JANTAJ; ISSN: 0021-8820

DOCUMENT TYPE: Journal

LANGUAGE: English

ED Entered STN: 23 Aug 1992

GI



AB A series of azoliumylmethylcephemcarboxylates, e.g., I (R = Cl, Br, iodo, SMe, SMe, SO₂Me, SO₃Na) and II (R₁ = H, 1-, 3-, 5-, 7-Me, 7-Cl, 7-CO₂Me, 7-cyano) were prepared and tested for antibacterial activity. II (R₁ = H) showed good antibacterial activity against both *Staphylococcus aureus* including methicillin-resistant strains and *Pseudomonas aeruginosa*.

IT 106850-43-5P 106850-52-6P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)

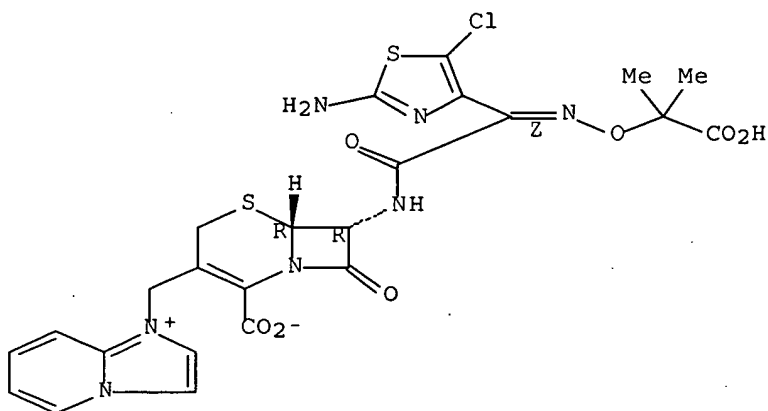
(preparation and bactericidal activity of)

RN 106850-43-5 CAPLUS

CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-5-chloro-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.



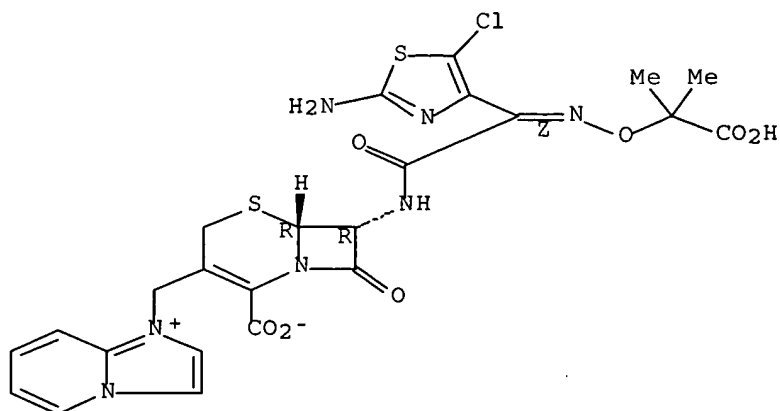
RN 106850-52-6 CAPLUS

CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-5-chloro-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, monosodium salt,

[6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

PAGE 1-A



PAGE 2-A

● Na

L17 ANSWER 6 OF 6 CAPLUS COPYRIGHT 2006 ACS on STN
ACCESSION NUMBER: 1987:101958 CAPLUS Full-text
DOCUMENT NUMBER: 106:101958
TITLE: Antibacterial cephem analogs
INVENTOR(S): Miyake, Akio; Kondo, Masahiro; Fujino, Masahiko
PATENT ASSIGNEE(S): Takeda Chemical Industries, Ltd., Japan
SOURCE: PCT Int. Appl., 195 pp.
CODEN: PIXXD2
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 4
PATENT INFORMATION:

1185

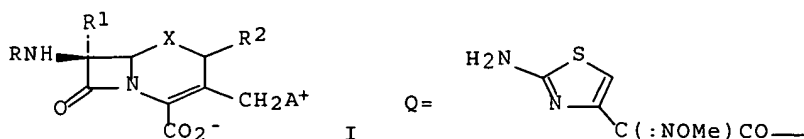
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 8605184	A1	19860912	WO 1985-JP102	19850301
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NO 8501538	A	19851024	NO 1985-1538	19850417
NO 165842	B	19910107		
NO 165842	C	19910417		
EP 160252	A2	19851106	EP 1985-104687	19850418
EP 160252	A3	19870114		
EP 160252	B1	19921223		
R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE				
AT 79882	E	19920915	AT 1985-104687	19850418
DK 8501799	A	19851024	DK 1985-1799	19850422
FI 8501592	A	19851024	FI 1985-1592	19850422
JP 60231684	A2	19851118	JP 1985-86746	19850422

ES 542447	A1	19860401	ES 1985-542447	19850422
SU 1595341	A3	19900923	SU 1985-3896500	19850422
AU 8541700	A1	19851031	AU 1985-41700	19850423
AU 580995	B2	19890209		
US 4788185	A	19881129	US 1985-726438	19850423
CA 1283096	A1	19910416	CA 1985-479769	19850423
CN 85105797	A	19860827	CN 1985-105797	19850730
ES 549180	A1	19870716	ES 1985-549180	19851122
NO 8504730	A	19851024	NO 1985-4730	19851126
NO 167293	B	19910715		
NO 167293	C	19911023		
NO 8600725	A	19860902	NO 1986-725	19860227
NO 166283	B	19910318		
NO 166283	C	19910626		
EP 203271	A2	19861203	EP 1986-102584	19860227
EP 203271	A3	19880601		
EP 203271	B1	19930526		
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AT 89826	E	19930615	AT 1986-102584	19860227
DK 8600935	A	19860902	DK 1986-935	19860228
FI 8600870	A	19860902	FI 1986-870	19860228
FI 85858	B	19920228		
FI 85858	C	19920610		
AU 8654168	A1	19860904	AU 1986-54168	19860228
AU 598728	B2	19900705		
WO 8605183	A1	19860912	WO 1986-JP99	19860228
W: SU				
CN 86102034	A	19870107	CN 1986-102034	19860228
CN 1030657	B	19960110		
ES 552525	A1	19870516	ES 1986-552525	19860228
JP 62149682	A2	19870703	JP 1986-44991	19860228
JP 02057074	B4	19901203		
CA 1295995	A1	19920218	CA 1986-502935	19860228
ZA 8601566	A	19871125	ZA 1986-1566	19860303
ES 553666	A1	19870616	ES 1986-553666	19860403
ES 557129	A1	19871201	ES 1986-557129	19861003
SU 1678211	A3	19910915	SU 1986-4028462	19861031
ES 557182	A1	19880101	ES 1986-557182	19861103
ES 557182	A5	19880128		
ES 557183	A1	19880101	ES 1986-557183	19861103
ES 557183	A5	19880128		
SU 1788955	A3	19930115	SU 1988-4355188	19880211
JP 03047189	A2	19910228	JP 1990-169780	19900629
JP 07030089	B4	19950405		
RU 2024529	C1	19941215	RU 1990-4831061	19900921
RU 2059641	C1	19960510	RU 1992-5052288	19920630

PRIORITY APPLN. INFO.:

WO 1984-JP212	A	19840423
WO 1984-JP270	A	19840525
WO 1985-JP102	A	19850301
NO 1985-1538	A	19850417
EP 1985-104687	A	19850418
JP 1985-209320	A	19850920
EP 1986-102584	A	19860227
WO 1986-JP99	W	19860228

ED Entered STN: 05 Apr 1987
GI



AB The title compds. [I; R = H, acyl, alkoxycarbonyl, N-containing heterocyclyl(substituted hydroxyimino)acetyl; R₁ = H, OMe, HCONH; R₂ = H, Me, OH, halo; A⁺ = (un)substituted fused imidazolium-1-yl; X = S, S(O), O, CH₂], useful as antibacterials (no data), were prepared Thus, a solution of 7β-[2-(2-aminothiazol-4-yl)-2(Z)-(methoxyiminoacetamido)]-3-(3-oxobutyryloxymethyl)-3-cephem-4-carboxylic acid, 6-cyanoimidazo[1,2-*a*]pyridine, and KI in a 1:1 mixture of MeCN and H₂O was allowed to react at 60-70° for 1.5 h to give 7β-(Z)-I [R = Q, R₁ = R₂ = H, A⁺ = 6-cyanoimidazo[1,2-*a*]pyridinium-1-yl, X = S].

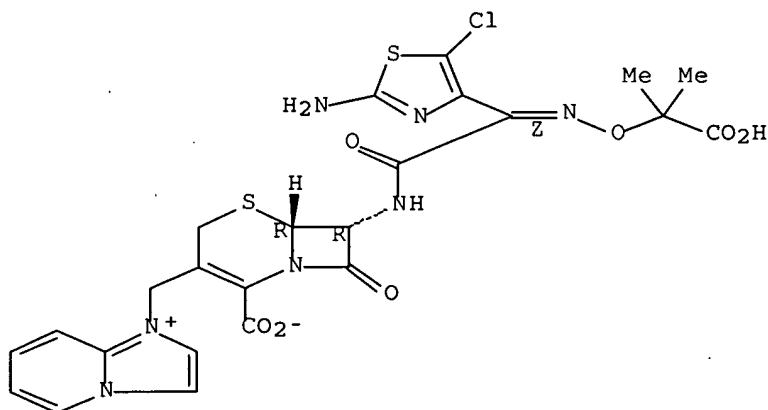
IT 106850-43-5P 106850-52-6P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)
(preparation of, as antibacterial)

RN 106850-43-5 CAPLUS

CN Imidazo[1,2-*a*]pyridinium, 1-[[7-[[[(2-amino-5-chloro-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6α,7β(Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

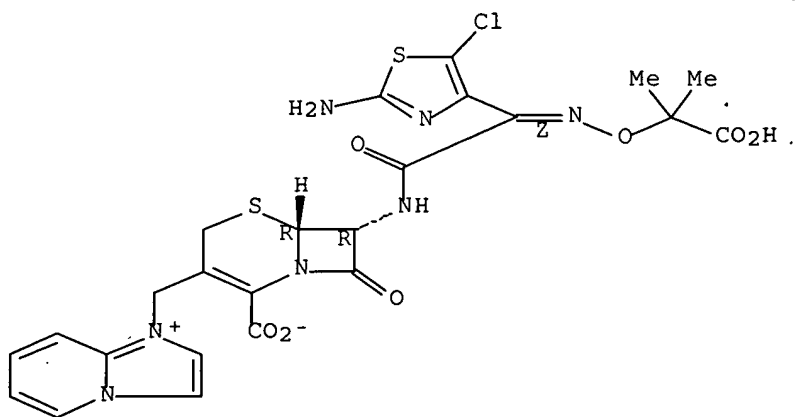


RN 106850-52-6 CAPLUS

CN Imidazo[1,2-*a*]pyridinium, 1-[[7-[[[(2-amino-5-chloro-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, monosodium salt, [6R-[6α,7β(Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

PAGE 1-A



PAGE 2-A

● Na

=>

=> => fil reg; d stat que l21; d stat que l23; fil capl; d que nos l27
FILE 'REGISTRY' ENTERED AT 16:05:39 ON 19 OCT 2006
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STRUCTURE FILE UPDATES: 18 OCT 2006 HIGHEST RN 910777-14-9
DICTIONARY FILE UPDATES: 18 OCT 2006 HIGHEST RN 910777-14-9

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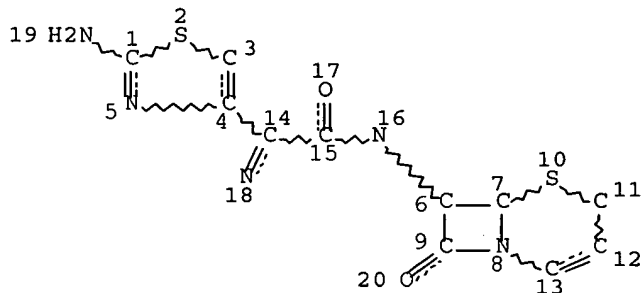
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experimental property data in the original document. For information
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<http://www.cas.org/ONLINE/UG/regprops.html>

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DEFAULT ECLEVEL IS LIMITED

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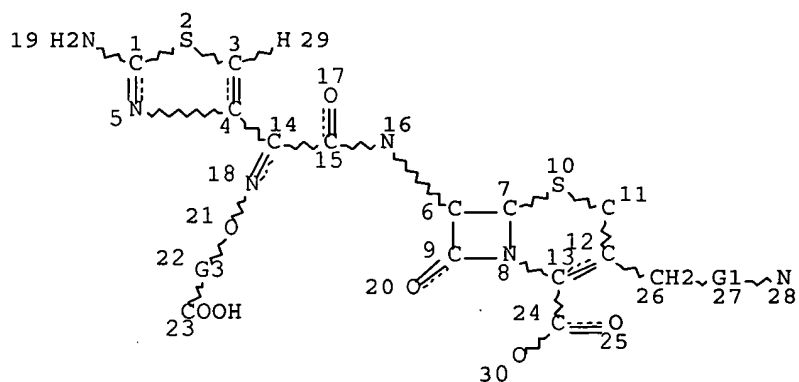
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L18 STR



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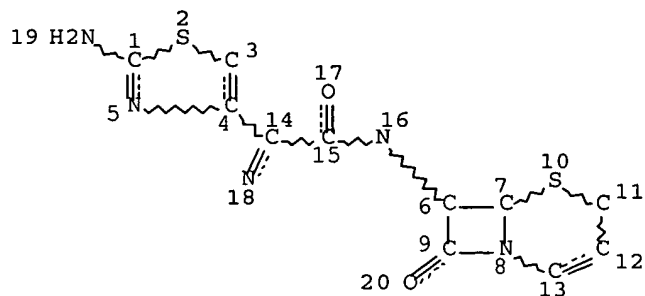
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STEREO ATTRIBUTES: NONE
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784 ANSWERS

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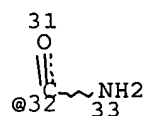
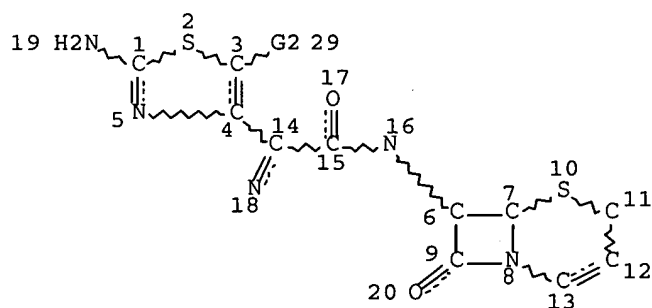


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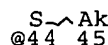
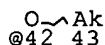
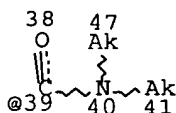
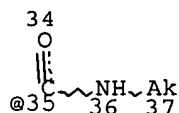
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 NUMBER OF NODES IS 20

STEREO ATTRIBUTES: NONE

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L19 STR



Ak @46



VAR G2=X/CN/32/35/39/42/44/46

NODE ATTRIBUTES:

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DEFAULT MLEVEL IS ATOM

MLEVEL IS CLASS AT 37 41 43 45 46 47

DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:

RING(S) ARE ISOLATED OR EMBEDDED

NUMBER OF NODES IS 38

STEREO ATTRIBUTES: NONE

L23 956 SEA FILE=REGISTRY SUB=L3 SSS FUL L19

100.0% PROCESSED 19554 ITERATIONS

956 ANSWERS

SEARCH TIME: 00.00.01

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FILE LAST UPDATED: 18 Oct 2006 (20061018/ED)

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<http://www.cas.org/infopolicy.html>

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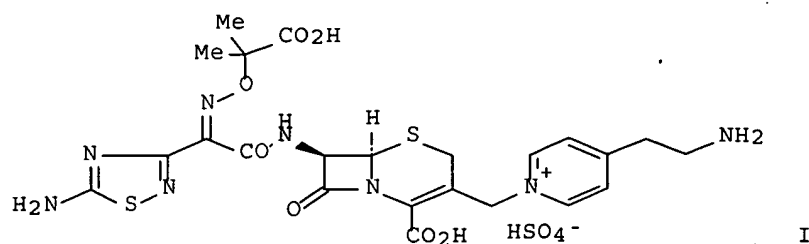
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L24 4998 SEA FILE=CAPLUS ABB=ON L21
L25 114 SEA FILE=CAPLUS ABB=ON L23
L26 19 SEA FILE=CAPLUS ABB=ON L24 AND L25
L27 16 SEA FILE=CAPLUS ABB=ON L26 AND PATENT/DT

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L27 ANSWER 1 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN
ACCESSION NUMBER: 2006:348558 CAPLUS Full-text
DOCUMENT NUMBER: 145:7928
TITLE: Preparation of cephem compounds for use in
antibacterial pharmaceutical compositions
INVENTOR(S): Okuda, Shinya; Murano, Kenji; Itoh, Kenji; Misumi,
Keiji; Satoh, Kenji; Kawabata, Kohji; Toda, Ayako;
Inoue, Satoshi; Ohki, Hidenori; Yamanaka, Toshio
PATENT ASSIGNEE(S): Wakunaga Pharmaceutical Co., Ltd., Japan; Astellas
Pharma, Inc.
SOURCE: Aust. Pat. Appl., 96 pp.
CODEN: AUXXCM
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
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AU 2005202802	A1	20060112	AU 2005-202802	20050627
PRIORITY APPLN. INFO.:			AU 2004-903529	A 20040628
			AU 2004-903705	A 20040706

OTHER SOURCE(S): MARPAT 145:7928
ED Entered STN: 17 Apr 2006
GI



AB Cephem derivs., such as I, were prepared starting from 4-methoxybenzyl 7 β -amino-3-(chloromethyl)-3-cephem-4-carboxylate hydrochloride for therapeutic use in the treatment of bacterial infections. The prepared cepheims were assayed for antibacterial activity against *Pseudomonas aeruginosa* FP 1456.

IT 72558-82-8, Ceftazidime

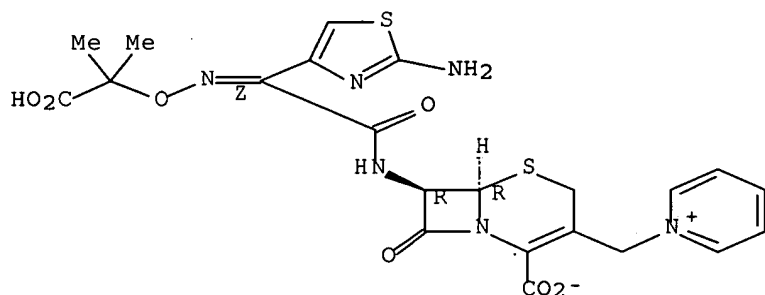
RL: PAC (Pharmacological activity); BIOL (Biological study)
(preparation of cephem compds. for use in antibacterial pharmaceutical compns.)

RN 72558-82-8 CAPLUS

CN Pyridinium, 1-[[[(6R,7R)-7-[[[(2Z)-(2-amino-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.



IT 887775-65-7P 887775-67-9P 887775-74-8P

887775-79-3P 887775-82-8P 887775-87-3P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(preparation of cephem compds. for use in antibacterial pharmaceutical compns.)

RN 887775-65-7 CAPLUS

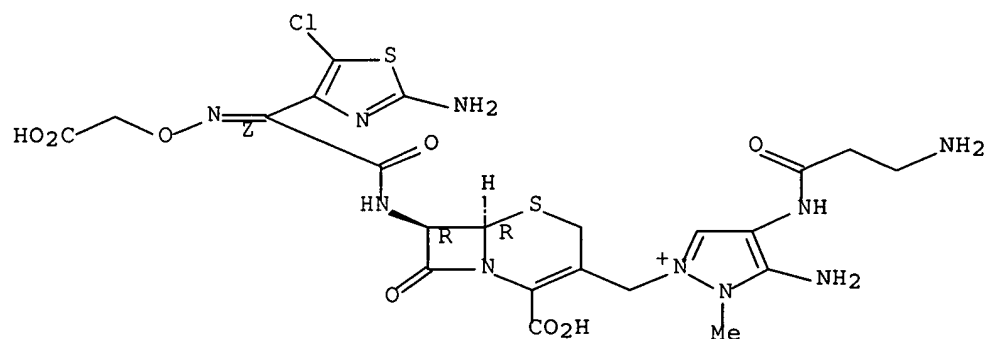
CN 1H-Pyrazolium, 5-amino-2-[[[(6R,7R)-7-[[[(2Z)-(2-amino-5-chloro-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-4-[(3-amino-1-oxopropyl)amino]-1-methyl-, sulfate (1:1) (9CI) (CA INDEX NAME)

CM 1

CRN 887775-64-6

CMF C22 H26 Cl N10 O8 S2

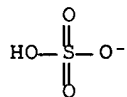
Absolute stereochemistry.
Double bond geometry as shown.



CM 2

CRN 14996-02-2

CMF H O4 S



RN 887775-67-9 CAPLUS

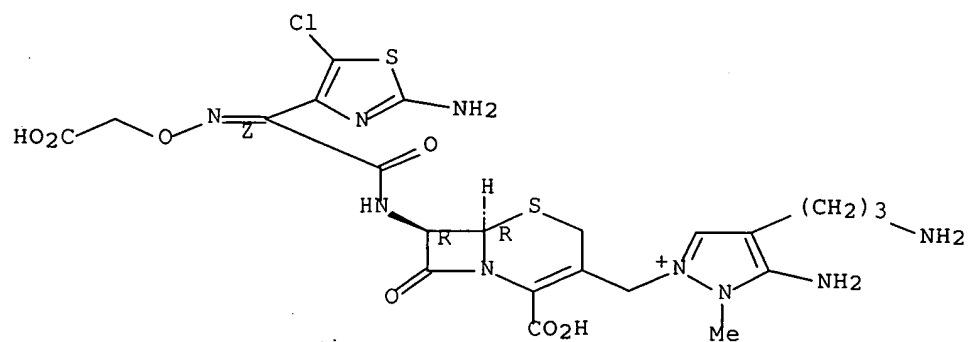
CN 1H-Pyrazolium, 5-amino-2-[[[(6R,7R)-7-[[[(2Z)-(2-amino-5-chloro-4-thiazolyl) [(carboxymethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-4-(3-aminopropyl)-1-methyl-, sulfate (1:1) (9CI) (CA INDEX NAME)

CM 1

CRN 887775-66-8

CMF C22 H27 Cl N9 O7 S2

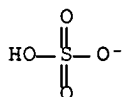
Absolute stereochemistry.
Double bond geometry as shown.



CM 2

CRN 14996-02-2

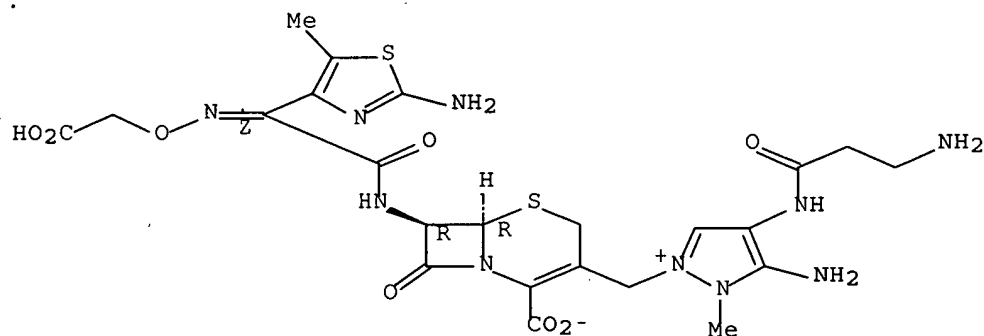
CMF H O4 S



RN 887775-74-8 CAPLUS

CN 1H-Pyrazolium, 5-amino-2-[[[(6R,7R)-7-[[[(2Z)-(2-amino-5-methyl-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-4-[(3-amino-1-oxopropyl)amino]-1-methyl-, inner salt (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 887775-79-3 CAPLUS

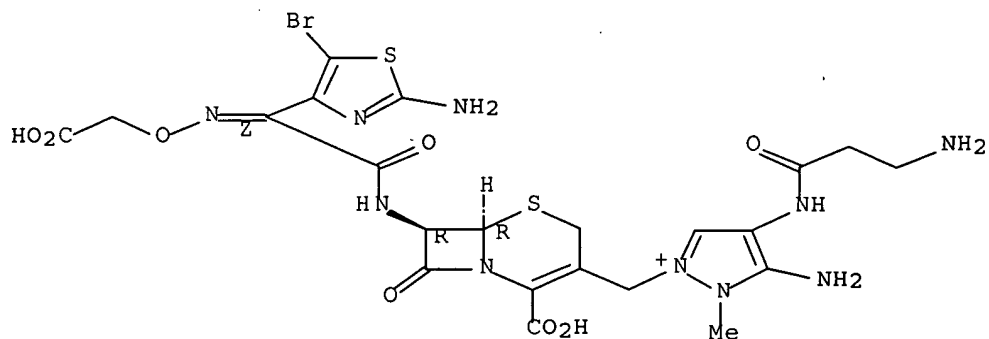
CN 1H-Pyrazolium, 5-amino-2-[[[(6R,7R)-7-[[[(2Z)-(2-amino-5-bromo-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-4-[(3-amino-1-oxopropyl)amino]-1-methyl-, sulfate (1:1) (9CI) (CA INDEX NAME)

CM 1

CRN 887775-78-2

CMF C22 H26 Br N10 O8 S2

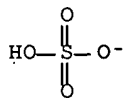
Absolute stereochemistry.
Double bond geometry as shown.



CM 2

CRN 14996-02-2

CMF H O4 S



RN 887775-82-8 CAPLUS

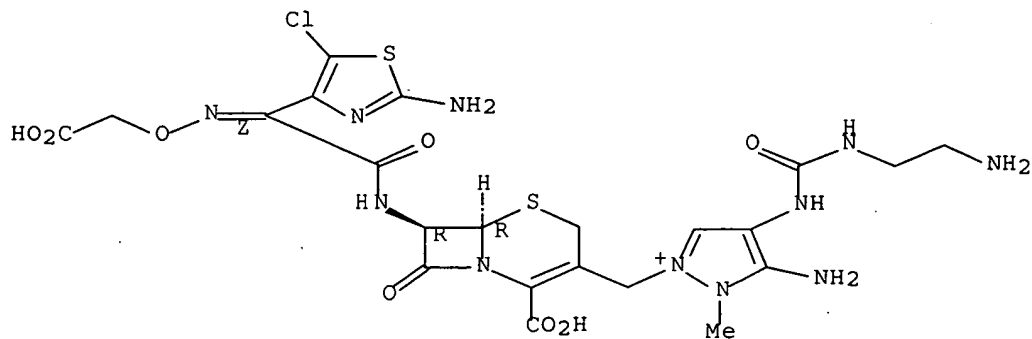
CN 1H-Pyrazolium, 5-amino-2-[[[(6R,7R)-7-[[[(2Z)-(2-amino-5-chloro-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-4-[[[(2-aminoethyl)amino]carbonyl]amino]-1-methyl-, sulfate (1:1) (9CI) (CA INDEX NAME)

CM 1

CRN 887775-81-7

CMF C22 H27 Cl N11 O8 S2

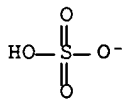
Absolute stereochemistry.
Double bond geometry as shown.



CM 2

CRN 14996-02-2

CMF H O4 S



RN 887775-87-3 CAPLUS

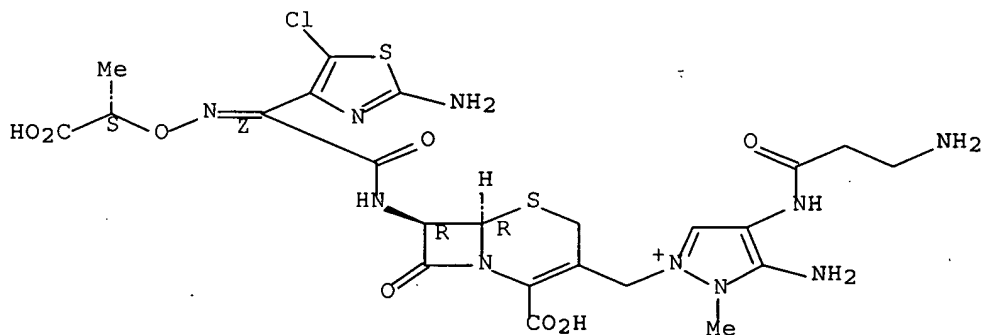
CN 1H-Pyrazolium, 5-amino-2-[[[(6R,7R)-7-[[[(2Z)-(2-amino-5-chloro-4-thiazolyl)[[(1S)-1-carboxyethoxy]imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-4-[(3-amino-1-oxopropyl)amino]-1-methyl-, sulfate (1:1) (9CI) (CA INDEX NAME)

CM 1

CRN 887775-86-2

CMF C23 H28 Cl N10 O8 S2

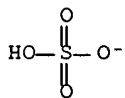
Absolute stereochemistry.
Double bond geometry as shown.



CM 2

CRN 14996-02-2

CMF H O4 S



IT 887775-80-6P

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation of cephem compds. for use in antibacterial pharmaceutical

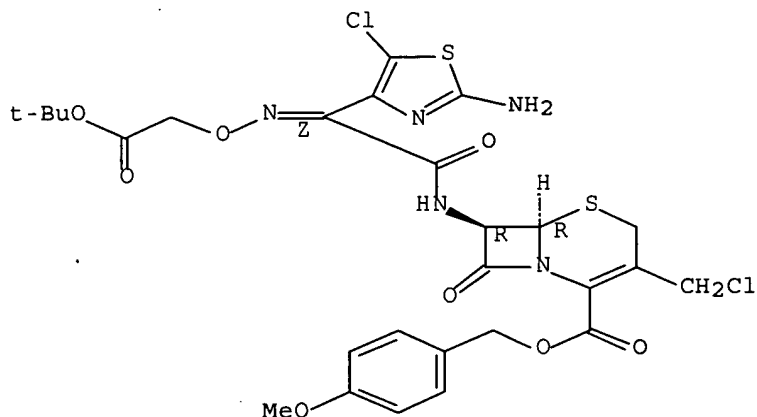
compns.)

RN 887775-80-6 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2Z)-(2-amino-5-chloro-4-thiazolyl)[[2-(1,1-dimethylethoxy)-2-oxoethoxy]imino]acetyl]amino]-3-(chloromethyl)-8-oxo-,
(4-methoxyphenyl)methyl ester, (6R,7R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.



L27 ANSWER 2 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 2004:533957 CAPLUS Full-text

DOCUMENT NUMBER: 141:82294

TITLE: Methods for treating and preventing gram-positive bacteremias by administering ramoplanin to decolonize the intestinal tract

INVENTOR(S): Parenti, Francesco; Fuchs, Henry; Leach, Timothy S.

PATENT ASSIGNEE(S): Italy

SOURCE: U.S. Pat. Appl. Publ., 16 pp.

CODEN: USXXCO

DOCUMENT TYPE: **Patent**

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

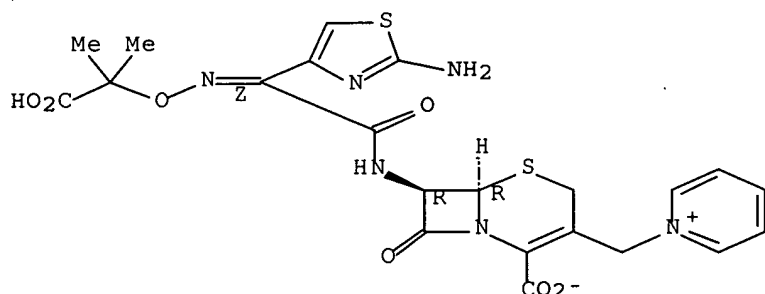
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
-----	---	----	-----	-----
US 2004127403	A1	20040701	US 2003-655185	20030904
PRIORITY APPLN. INFO.:			US 2002-408596P	P 20020906
			US 2002-419117P	P 20021018

ED Entered STN: 02 Jul 2004

AB The present invention provides methods and compns. useful for preventing a bacteremia by administering ramoplanin to decolonize the intestinal tract of a patient. Also disclosed are methods for treating bacteremias using combination therapy directed both toward treating the infection as well as decolonizing the intestinal tract of the patient. The invention is particularly useful against antibiotic-resistant Gram-pos. bacteria, such as vancomycin-resistant Enterococcus (VRE), methicillin-resistant Staphylococcus aureus (MRSA), vancomycin-resistant Staphylococcus aureus (VRSA), glycopeptide intermediary susceptible Staphylococcus aureus (GISA), and coagulase-neg. staphylococci.

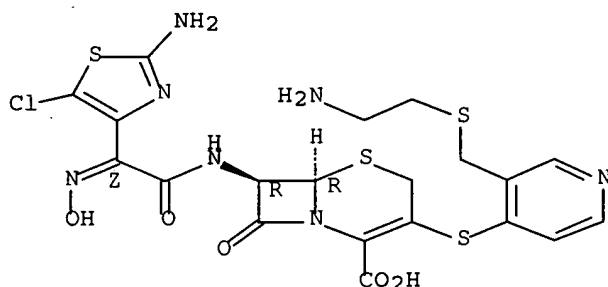
IT 72558-82-8, Ceftazidime 189448-35-9, MC-02479
 RL: BSU (Biological study, unclassified); PAC (Pharmacological activity);
 THU (Therapeutic use); BIOL (Biological study); USES (Uses)
 (as bioavailable antibiotic for treating bacteremia in combination with
 oral ramoplanin; treating and preventing gram-pos. bacteremias with
 ramoplanin to decolonize the intestinal tract)
 RN 72558-82-8 CAPLUS
 CN Pyridinium, 1-[[[(6R,7R)-7-[[[(2Z)-(2-amino-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt (9CI) (CA INDEX NAME)

Absolute stereochemistry.
 Double bond geometry as shown.



RN 189448-35-9 CAPLUS
 CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
 7-[[[(2Z)-(2-amino-5-chloro-4-thiazolyl)(hydroxyimino)acetyl]amino]-3-[[3-[[[(2-aminoethyl)thio]methyl]-4-pyridinyl]thio]-8-oxo-, (6R,7R)- (9CI) (CA INDEX NAME)

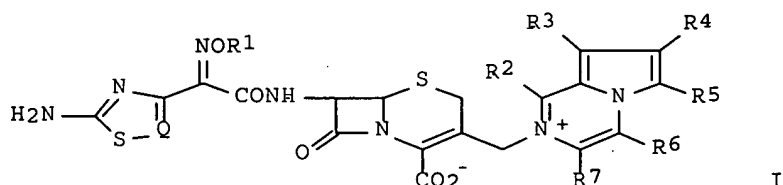
Absolute stereochemistry.
 Double bond geometry as shown.



L27 ANSWER 3 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN
 ACCESSION NUMBER: 1994:680468 CAPLUS Full-text
 DOCUMENT NUMBER: 121:280468
 TITLE: Preparation of cephalosporin derivatives
 INVENTOR(S): Lee, Jong Wook; Chae, Jeong Seok; Choi, Young Ro; Lee, Yeong Nam; Rho, Eun Rae; Kang, Heui Il; Hyun, Jae Woo
 PATENT ASSIGNEE(S): Yuhan Corp., S. Korea
 SOURCE: PCT Int. Appl., 103 pp.
 CODEN: PIXXD2

DOCUMENT TYPE: Patent
 LANGUAGE: English
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 9407898	A1	19940414	WO 1993-KR87	19930928
W: JP, US				
RW: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE				
KR 157073	B1	19981116	KR 1993-17578	19930903
EP 662973	A1	19950719	EP 1993-922071	19930928
R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LI, LU, MC, NL, PT, SE				
JP 08502734	T2	19960326	JP 1993-508913	19930928
CN 1169431	A	19980107	CN 1994-103365	19940331
US 5593984	A	19970114	US 1995-411767	19950331
PRIORITY APPLN. INFO.:			KR 1992-17969	A 19921001
			WO 1993-KR87	W 19930928
OTHER SOURCE(S):		MARPAT 121:280468		
ED Entered STN:		10 Dec 1994		
GI				



AB Title compds. I (R1 = H, (halo)C1-3 alkyl, propargyl, HO2CRbRaC wherein Ra, Rb = H, C1-3 alkyl; R2, R3, R4, R5, R6 and R7 = H, halo, C1-3 alkyl, H2N, HO-C1-3 alkythio, NC, H2NCO, HO2C, HO-C1-3 alkyl, O2N, Ac, HCO; Q = HC, N, ClC) or salt thereof, useful as antibiotics, are prepared 7-Amino-3-(pyrrolo[1,2-
 alpyrazinium-2-yl)methyl-3-cephem-4-carboxylate (preparation given) and 2-(2-
 aminothiazol-4-yl)-2-(methoxyimino)acetic acid-N-hydroxybenzotriazol were
 added to H2O/MeCN to give 7-β-[(Z)-2-(2-aminothiazol-4-
 yl)methoxyiminoacetamido]-3-(pyrrolo[1,2- alpyrazinium-2-yl)methyl-3-cephem-4-
 carboxylate. I possess potent and broad antibacterial activities, compared
 with the known ceftazidime and cefotaxime and they exhibit 2-10 and 2-4 times
 antibacterial activities against Gram-pos. and -neg bacteria, resp.

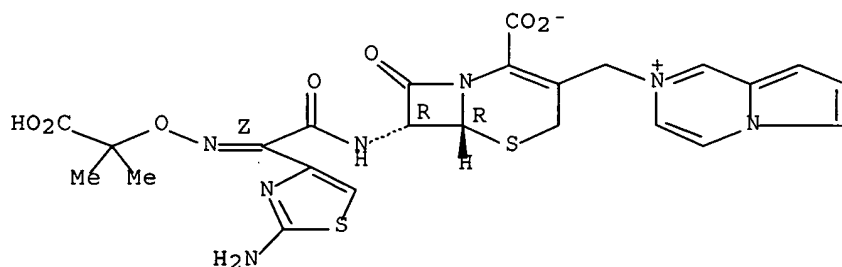
IT 158945-09-6P 158945-30-3P 158945-31-4P
 158945-54-1P 158945-56-3P 158945-59-6P
 158945-61-0P 158945-63-2P 158945-65-4P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological
 study, unclassified); SPN (Synthetic preparation); BIOL (Biological
 study); PREP (Preparation)
 (preparation of, as antibiotic)

RN 158945-09-6 CAPLUS

CN Pyrrolo[1,2-al]pyrazinium, 2-[[7-[[[(2-amino-4-thiazolyl)][(1-carboxy-1-
 methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-
 azabicyclo[4.2.0]oct-2-en-3-yl)methyl]-, inner salt, [6R-
 [6α,7β(Z)]]- (9CI) (CA INDEX NAME)

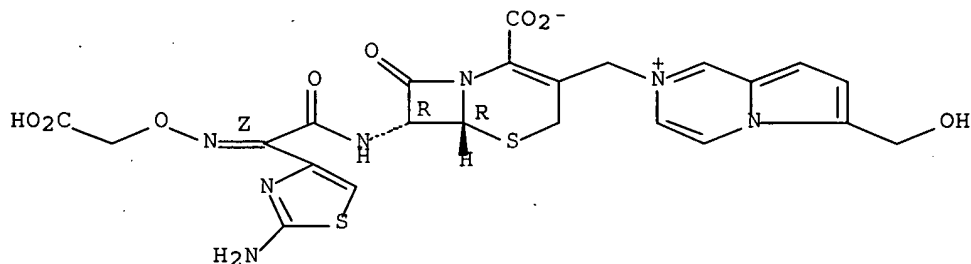
Absolute stereochemistry.
Double bond geometry as shown.



RN 158945-30-3 CAPLUS

CN Pyrrolo[1,2-a]pyrazinium, 2-[[7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-6-(hydroxymethyl)-, inner salt, [6R-[6 α ,7 β (Z)]]-(9CI) (CA INDEX NAME)

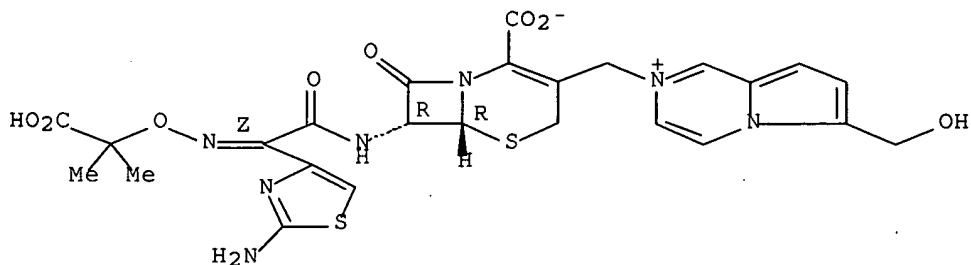
Absolute stereochemistry.
Double bond geometry as shown.



RN 158945-31-4 CAPLUS

CN Pyrrolo[1,2-a]pyrazinium, 2-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-6-(hydroxymethyl)-, inner salt, [6R-[6 α ,7 β (Z)]]-(9CI) (CA INDEX NAME)

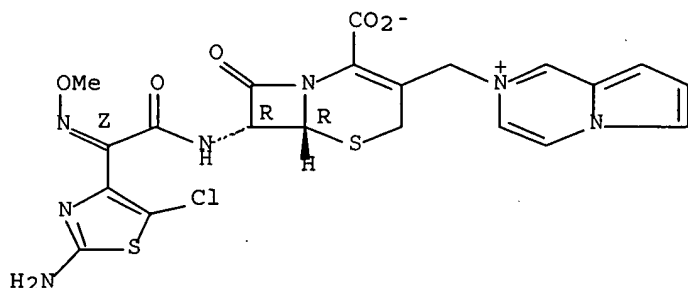
Absolute stereochemistry.
Double bond geometry as shown.



RN 158945-54-1 CAPLUS

CN Pyrrolo[1,2-a]pyrazinium, 2-[[7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl)methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

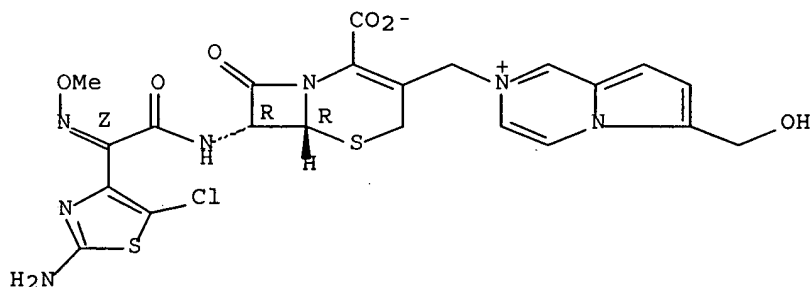
Absolute stereochemistry.
Double bond geometry as shown.



RN 158945-56-3 CAPLUS

CN Pyrrolo[1,2-a]pyrazinium, 2-[[7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl)methyl]-6-(hydroxymethyl)-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

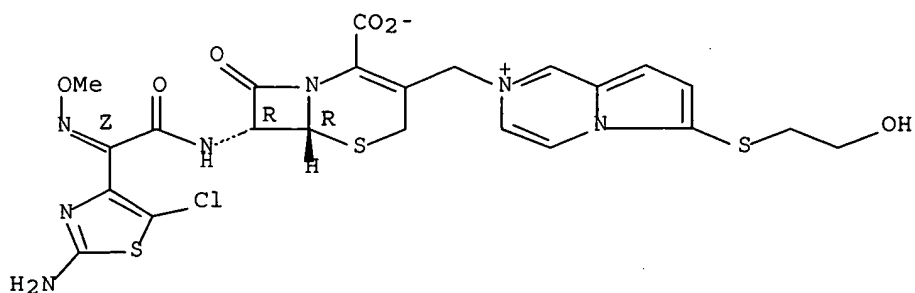
Absolute stereochemistry.
Double bond geometry as shown.



RN 158945-59-6 CAPLUS

CN Pyrrolo[1,2-a]pyrazinium, 2-[[7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl)methyl]-6-[(2-hydroxyethyl)thio]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

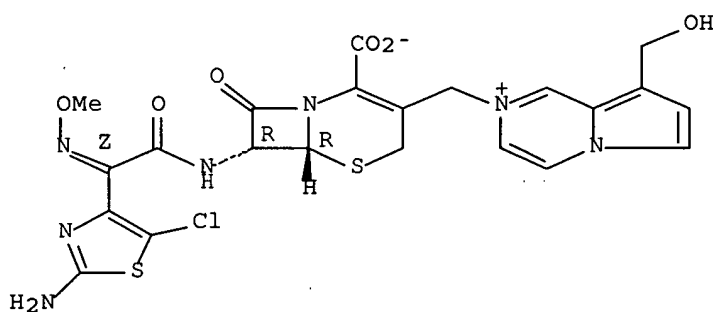
Absolute stereochemistry.
Double bond geometry as shown.



RN 158945-61-0 CAPLUS

CN Pyrrolo[1,2-a]pyrazinium, 2-[[7-[[[(2-amino-5-chloro-4-thiazolyl) (methoxyimino) acetyl] amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-8-(hydroxymethyl)-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

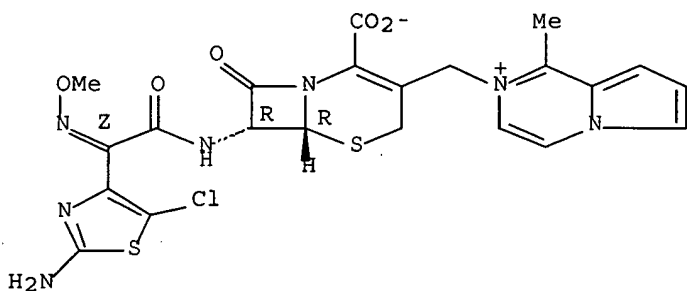
Absolute stereochemistry.
Double bond geometry as shown.



RN 158945-63-2 CAPLUS

CN Pyrrolo[1,2-a]pyrazinium, 2-[[7-[[[(2-amino-5-chloro-4-thiazolyl) (methoxyimino) acetyl] amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-1-methyl-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

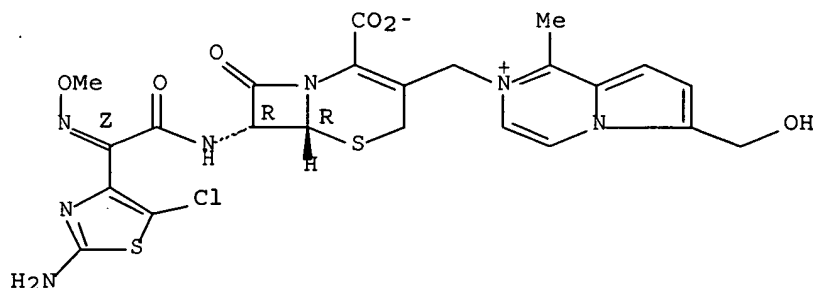
Absolute stereochemistry.
Double bond geometry as shown.



RN 158945-65-4 CAPLUS

CN Pyrrolo[1,2-a]pyrazinium, 2-[[7-[[[(2-amino-5-chloro-4-thiazolyl) (methoxyimino) acetyl] amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-6-(hydroxymethyl)-1-methyl-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

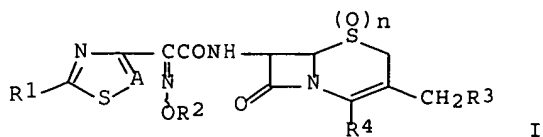
Absolute stereochemistry.
Double bond geometry as shown.



L27 ANSWER 4 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN
 ACCESSION NUMBER: 1993:603232 CAPLUS Full-text
 DOCUMENT NUMBER: 119:203232
 TITLE: Preparation of cephalosporin derivatives as antibacterial agents
 INVENTOR(S): Tanaka, Kyoshi; Sutani, Mineichi; Komatsu, Miwako; Tsuchida, Keiichi; Saito, Akito; Hayashi, Kazuya; Kanna, Hiroshi; Yonezawa, Kenji; Minami, Shinzaburo; Watanabe, Yasuo
 PATENT ASSIGNEE(S): Toyama Chemical Co Ltd, Japan
 SOURCE: Jpn. Kokai Tokkyo Koho, 28 pp.
 CODEN: JKXXAF
 DOCUMENT TYPE: Patent
 LANGUAGE: Japanese
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 05070469	A2	19930323	JP 1991-343925	19911202
JP 3141040	B2	20010305		

PRIORITY APPLN. INFO.: JP 1991-202416 A1 19910717
 OTHER SOURCE(S): MARPAT 119:203232
 ED Entered STN: 13 Nov 1993
 GI

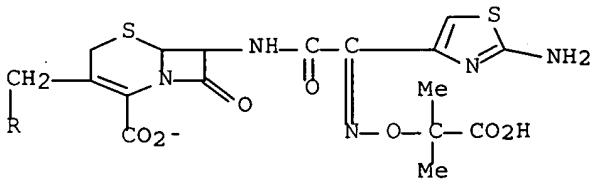


IT 150364-37-7P 150364-44-6P

RN 150364-37-7 CAPLUS

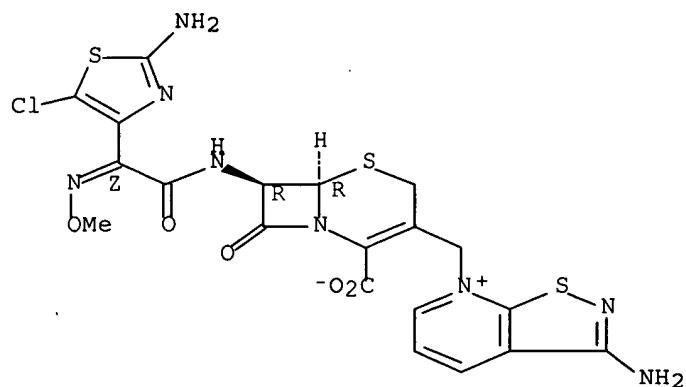
Nc1nc2cc[nH+]2c3ccccc13R

● Na



CN Isothiazolo[5,4-b]pyridinium, 3-amino-7-[[7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



IT 150364-17-3P

RL: SPN (Synthetic preparation); PREP (Preparation)

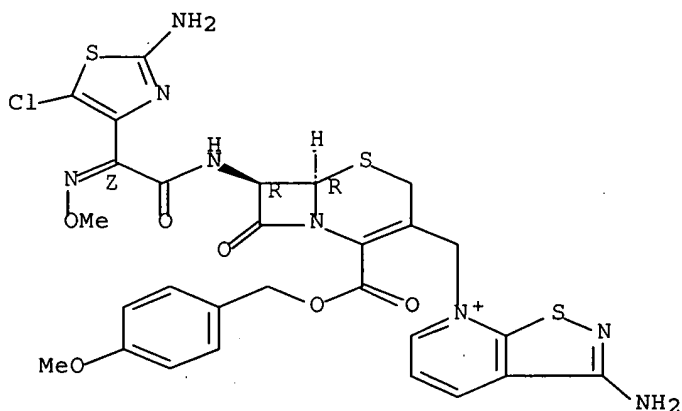
(preparation of, as intermediate for antibacterial cephalosporin derivative)

RN 150364-17-3 CAPLUS

CN Isothiazolo[5,4-b]pyridinium, 3-amino-7-[[7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-[[[(4-methoxyphenyl)methoxy]carbonyl]-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.



L27 ANSWER 5 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 1989:94856 CAPLUS Full-text

DOCUMENT NUMBER: 110:94856

TITLE: Preparation of 3-(imidazopyridinomethyl)cephalosporins as antibiotics

INVENTOR(S): Lattrell, Rudolf; Duerckheimer, Walter; Kirrstetter, Reiner; Seibert, Gerhard

PATENT ASSIGNEE(S): Hoechst A.-G., Fed. Rep. Ger.

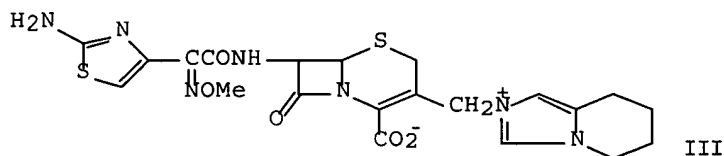
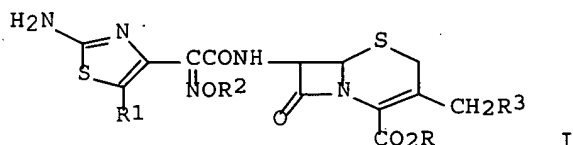
SOURCE: Ger. Offen., 14 pp.

CODEN: GWXXBX

DOCUMENT TYPE: Patent

LANGUAGE: German
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 3707019	A1	19880915	DE 1987-3707019	19870305
EP 281092	A2	19880907	EP 1988-103144	19880302
EP 281092	A3	19900509		
R: AT, BE, CH, DE, ES, FR, GB, GR, IT, LI, LU, NL, SE				
DK 8801200	A	19880906	DK 1988-1200	19880304
AU 8812640	A1	19880908	AU 1988-12640	19880304
AU 609452	B2	19910502		
ZA 8801556	A	19881026	ZA 1988-1556	19880304
JP 01042491	A2	19890214	JP 1988-51402	19880304
PRIORITY APPLN. INFO.:			DE 1987-3707019	A 19870305
OTHER SOURCE(S):			MARPAT 110:94856	
ED Entered STN: 17 Mar 1989				
GI				



AB The title compds. [I; R = neg. charge; R1 = H, halo; R2 = H, (un)substituted alkyl, alkenyl, (CH2)n(CR1R5)mR6, etc.; R3 = (un)substituted 5,6,7,8-tetrahydroimidazo[1,2-a]- or -[1,5-a]pyridino; R4, R5 = H, alkyl; CR4R5 = vinylidene, cycloalkylidene; R6 = CO2H, alkoxycarbonyl; m, n = 0, 1] were prepared as antibiotics (no data). Cephalosporanic acid I (R = R1 = H; R2 = Me, R3 = OAc) and CF3C(:NSiMe3)OSiMe3 (II) were refluxed 1 h in CH2Cl2 whereupon Me3SiI was added and the mixture stirred 20 min to give I (R-R2 as above, R3 = iodo) which was stirred 4 h with 5,6,7,8-tetrahydroimidazo[1,5-a]pyridine in MeCN containing II to give title compound III.HI.

IT 118902-35-5P 118929-12-7P 118929-13-8P
 118929-14-9P 118929-16-1P 118929-19-4P
 118929-20-7P

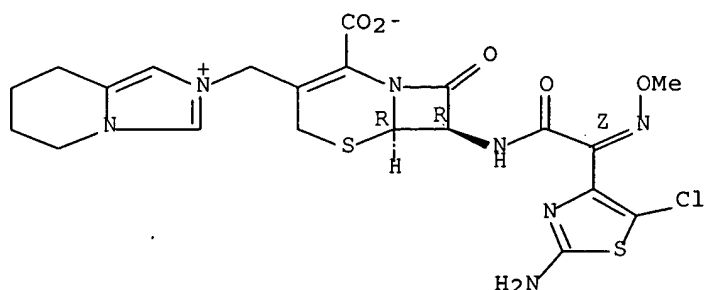
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)
 (preparation of, as antibiotic)

RN 118902-35-5 CAPLUS

CN Imidazo[1,5-a]pyridinium, 2-[[7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-5,6,7,8-tetrahydro-, inner salt, [6R-[6α,7β(Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.

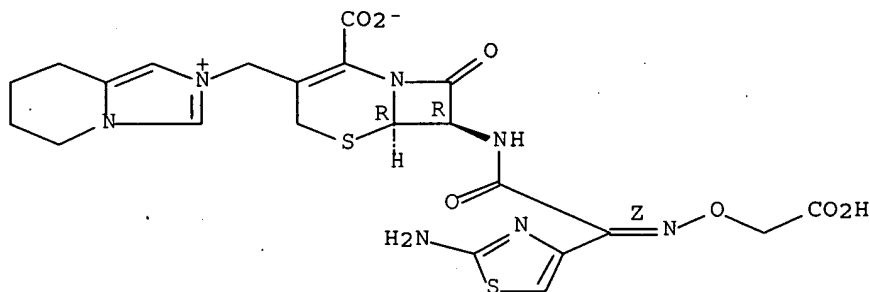


RN 118929-12-7 CAPLUS

CN Imidazo[1,5-a]pyridinium, 2-[[7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-5,6,7,8-tetrahydro-, inner salt, [6R-[6 α ,7 β (Z)]]-(9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.

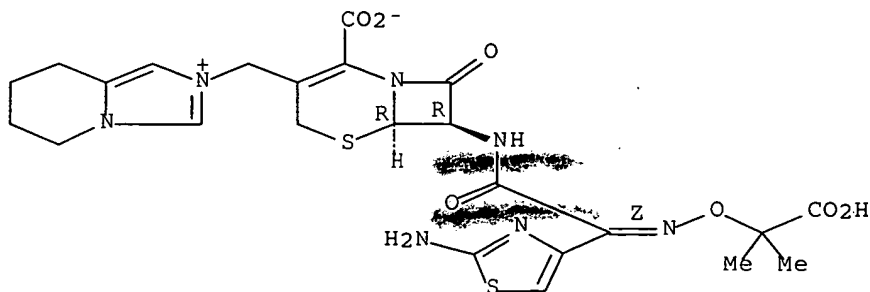


RN 118929-13-8 CAPLUS

CN Imidazo[1,5-a]pyridinium, 2-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-5,6,7,8-tetrahydro-, inner salt, [6R-[6 α ,7 β (Z)]]-(9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.

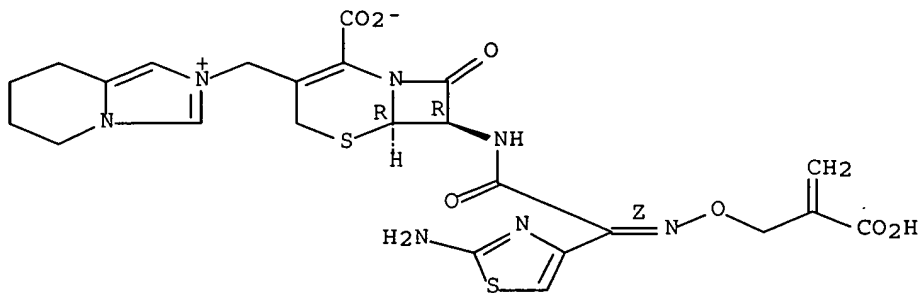


RN 118929-14-9 CAPLUS

CN Imidazo[1,5-a]pyridinium, 2-[[[7-[[[(2-amino-4-thiazolyl)[[(2-carboxy-2-propenyl)oxy]imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-5,6,7,8-tetrahydro-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.

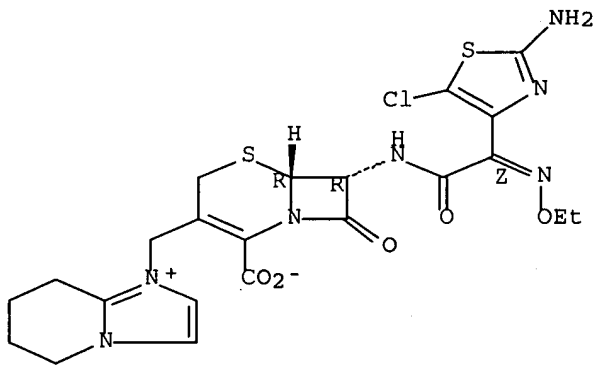


RN 118929-16-1 CAPLUS

CN Imidazo[1,2-a]pyridinium, 1-[[7-[[2-amino-5-chloro-4-thiazolyl)(ethoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl)methyl]-5,6,7,8-tetrahydro-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.

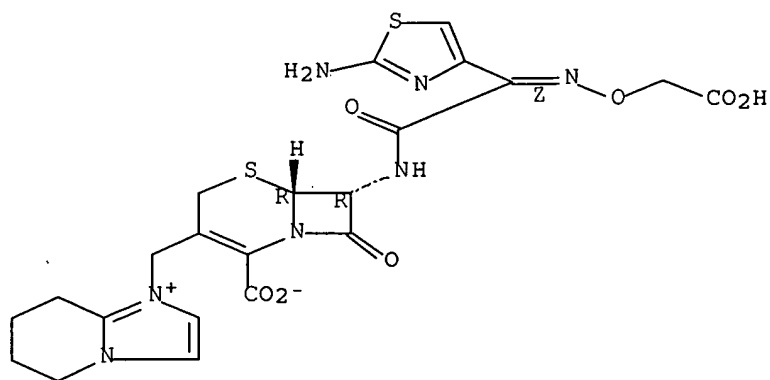


RN 118929-19-4 CAPLUS

CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl)methyl]-5,6,7,8-tetrahydro-, inner salt, [6R-[6 α ,7 β (Z)]]-(9CI) (CA INDEX NAME)

Absolute stereochemistry.

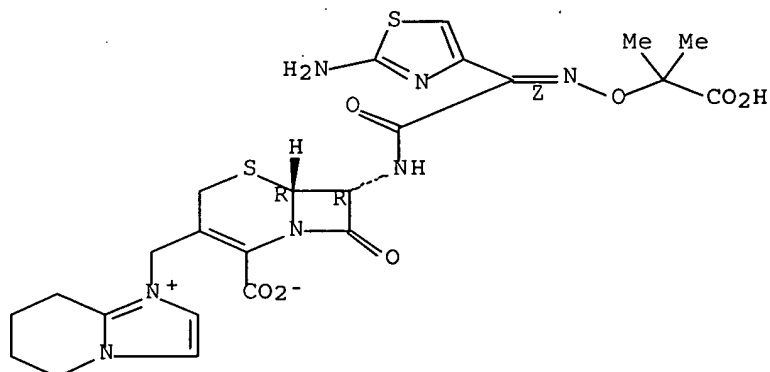
Double bond geometry as shown.



RN 118929-20-7 CAPLUS

CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-5,6,7,8-tetrahydro-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L27 ANSWER 6 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 1987:458744 CAPLUS Full-text

DOCUMENT NUMBER: 107:58744

TITLE: Cephalosporin analogs, their preparation, and their use against bacterial infections

INVENTOR(S): Lattrell, Rudolf; Duerckheimer, Walter; Kirrstetter, Reiner; Seibert, Gerhard

PATENT ASSIGNEE(S): Hoechst A.-G., Fed. Rep. Ger.

SOURCE: Ger. Offen., 13 pp.

CODEN: GWXXBX

DOCUMENT TYPE: Patent

LANGUAGE: German

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 3539901	A1	19870514	DE 1985-3539901	19851111

EP 222322	A2	19870520	EP 1986-115367	19861106
EP 222322	A3	19881005		
EP 222322	B1	19920506		
R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE				
AT 75746	E	19920515	AT 1986-115367	19861106
FI 8604537	A	19870512	FI 1986-4537	19861107
DK 8605369	A	19870512	DK 1986-5369	19861110
NO 8604475	A	19870512	NO 1986-4475	19861110
AU 8664968	A1	19870514	AU 1986-64968	19861110
AU 602131	B2	19901004		
JP 62114990	A2	19870526	JP 1986-267423	19861110
HU 42492	A2	19870728	HU 1986-4639	19861110
HU 197018	B	19890228		
ZA 8608518	A	19870729	ZA 1986-8518	19861110
ES 2002903	A6	19881001	ES 1986-2966	19861110

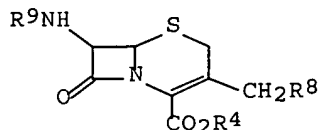
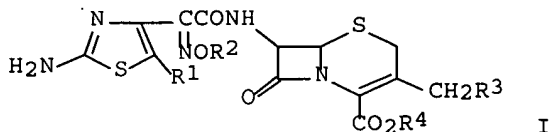
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DE 1985-3539901	A	19851111
EP 1986-115367	A	19861106

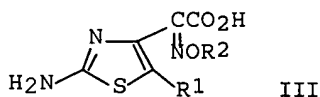
OTHER SOURCE(S): MARPAT 107:58744

ED Entered STN: 21 Aug 1987

GI



II



III

AB Cephalosporin analogs I [R1 = H, halo; R2 = H, (un)substituted C1-6 alkyl, halo (un)substituted C2-6 alkenyl or C3-7 cycloalkyl, C4-7 cycloalkenyl, C3-7 cycloalkylmethyl, (CH2)n(CR5R6)mR7; m, n = 0, 1; R5, R6 = H, aryl, C1-11 alkyl, CR5R6 = CH2, C3-7 cycloalkylidene; R7 = CO2H, C1-10 alkyl, cyano, CONH2, MeNHCO, Me2NCO; R3 = (un)substituted imidazol-1-yl; R4 = H, C1-6 alkanoyloxy-C1-6-alkyl, phthalidyl, C1-6 alkoxy-carbonyloxy-C1-6-alkyl, 5-methyl-1,3-dioxolan-2-on-4-ylmethyl; OR2 = syn] and their salts, useful against bacterial infections (see data), were prepared by a) reaction of I (R3 = R8 = group exchangeable with imidazole or a derivative) with imidazole or a derivative, then cleavage of an optional protective group; b) reaction of cephem derivative II (R9 = H, amino protective group) with imidazole or derivative to give II (R8 = R3), cleavage of an optional amino protective group, and reaction of II (R8 = R3, R9 = H) as such or as a reactive derivative with oxime III (optional protected NH2) or with a CO2H activated derivative of III and cleavage of an optional protective group. I (R4 = H) may be converted into an ester. 7-[2-(2-Amino-4-thiazolyl)-2-syn-methoxyiminoacetamido]cephalosporanic acid in CHCl3 was treated with N-methyl-N-trimethylsilyltrifluoroacetamide (IV) at room temperature, then with Me3SiI at 18°, and the product in MeCN-THF was treated with 2-methylimidazole and IV to give 88% syn-I (R1 = R4 = H, R2 = Me, R3 = 2-methylimidazol-1-yl) (V)·HI, which was chromatographed to give 60% V and 9% Δ2 analog.

IT 109267-25-6P 109267-29-0P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological

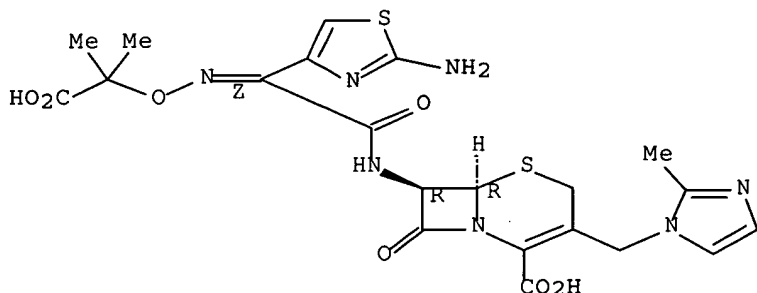
study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)
(preparation of, as antibacterial)

RN 109267-25-6 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl) [(1-carboxy-1-methylethoxy) imino] acetyl] amino] -3-
[(2-methyl-1H-imidazol-1-yl)methyl]-8-oxo-, [6R-[6 α ,7 β (Z)]]-
(9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.

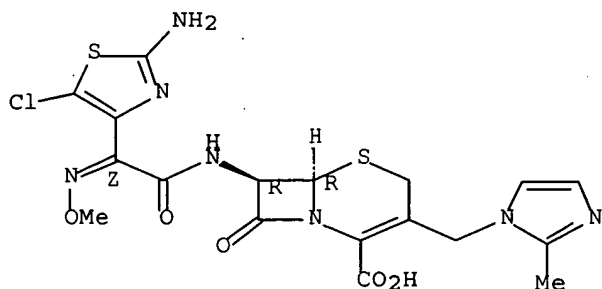


RN 109267-29-0 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-5-chloro-4-thiazolyl) (methoxyimino) acetyl] amino] -3-[(2-methyl-
1H-imidazol-1-yl)methyl]-8-oxo-, [6R-[6 α ,7 β (Z)]]- (9CI) (CA
INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.



L27 ANSWER 7 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 1987:101958 CAPLUS Full-text

DOCUMENT NUMBER: 106:101958

TITLE: Antibacterial cephem analogs

INVENTOR(S): Miyake, Akio; Kondo, Masahiro; Fujino, Masahiko

PATENT ASSIGNEE(S): Takeda Chemical Industries, Ltd., Japan

SOURCE: PCT Int. Appl., 195 pp.

CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: Japanese

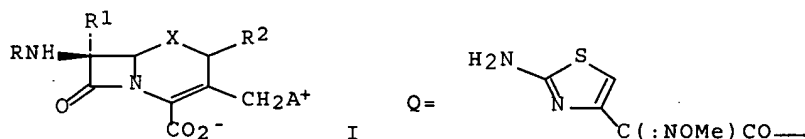
FAMILY ACC. NUM. COUNT: 4

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 8605184	A1	19860912	WO 1985-JP102	19850301
W: MC				
NO 8501538	A	19851024	NO 1985-1538	19850417
NO 165842	B	19910107		
NO 165842	C	19910417		
EP 160252	A2	19851106	EP 1985-104687	19850418
EP 160252	A3	19870114		
EP 160252	B1	19921223		
R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE				
AT 79882	E	19920915	AT 1985-104687	19850418
DK 8501799	A	19851024	DK 1985-1799	19850422
FI 8501592	A	19851024	FI 1985-1592	19850422
JP 60231684	A2	19851118	JP 1985-86746	19850422
ES 542447	A1	19860401	ES 1985-542447	19850422
SU 1595341	A3	19900923	SU 1985-3896500	19850422
AU 8541700	A1	19851031	AU 1985-41700	19850423
AU 580995	B2	19890209		
US 4788185	A	19881129	US 1985-726438	19850423
CA 1283096	A1	19910416	CA 1985-479769	19850423
CN 85105797	A	19860827	CN 1985-105797	19850730
ES 549180	A1	19870716	ES 1985-549180	19851122
NO 8504730	A	19851024	NO 1985-4730	19851126
NO 167293	B	19910715		
NO 167293	C	19911023		
NO 8600725	A	19860902	NO 1986-725	19860227
NO 166283	B	19910318		
NO 166283	C	19910626		
EP 203271	A2	19861203	EP 1986-102584	19860227
EP 203271	A3	19880601		
EP 203271	B1	19930526		
R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE				
AT 89826	E	19930615	AT 1986-102584	19860227
DK 8600935	A	19860902	DK 1986-935	19860228
FI 8600870	A	19860902	FI 1986-870	19860228
FI 85858	B	19920228		
FI 85858	C	19920610		
AU 8654168	A1	19860904	AU 1986-54168	19860228
AU 598728	B2	19900705		
WO 8605183	A1	19860912	WO 1986-JP99	19860228
W: SU				
CN 86102034	A	19870107	CN 1986-102034	19860228
CN 1030657	B	19960110		
ES 552525	A1	19870516	ES 1986-552525	19860228
JP 62149682	A2	19870703	JP 1986-44991	19860228
JP 02057074	B4	19901203		
CA 1295995	A1	19920218	CA 1986-502935	19860228
ZA 8601566	A	19871125	ZA 1986-1566	19860303
ES 553666	A1	19870616	ES 1986-553666	19860403
ES 557129	A1	19871201	ES 1986-557129	19861003
SU 1678211	A3	19910915	SU 1986-4028462	19861031
ES 557182	A1	19880101	ES 1986-557182	19861103
ES 557182	A5	19880128		
ES 557183	A1	19880101	ES 1986-557183	19861103
ES 557183	A5	19880128		
SU 1788955	A3	19930115	SU 1988-4355188	19880211

JP 03047189	A2	19910228	JP 1990-169780	19900629
JP 07030089	B4	19950405		
RU 2024529	C1	19941215	RU 1990-4831061	19900921
RU 2059641	C1	19960510	RU 1992-5052288	19920630
PRIORITY APPLN. INFO.:			WO 1984-JP212	A 19840423
			WO 1984-JP270	A 19840525
			WO 1985-JP102	A 19850301
			NO 1985-1538	A 19850417
			EP 1985-104687	A 19850418
			JP 1985-209320	A 19850920
			EP 1986-102584	A 19860227
			WO 1986-JP99	W 19860228

ED Entered STN: 05 Apr 1987
GI



AB The title compds. [I; R = H, acyl, alkoxycarbonyl, N-containing heterocyclyl(substituted hydroxyimino)acetyl; R1 = H, OMe, HCONH; R2 = H, Me, OH, halo; A+ = (un)substituted fused imidazolium-1-yl; X = S, S(O), O, CH2], useful as antibacterials (no data), were prepared Thus, a solution of 7 β -[2-(2-aminothiazol-4-yl)-2(Z)-(methoxyiminoacetamido)]-3-(3-oxobutyryloxymethyl)-3-cephem-4-carboxylic acid, 6-cyanoimidazo[1,2- α]pyridine, and KI in a 1:1 mixture of MeCN and H2O was allowed to react at 60-70° for 1.5 h to give 7 β -(Z)-I [R = Q, R1 = R2 = H, A+ = 6-cyanoimidazo[1,2- α]pyridinium-1-yl, X = S].

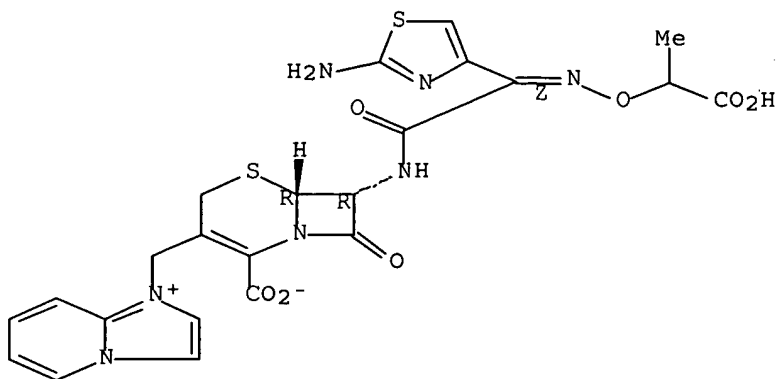
IT 103313-15-1P 106850-37-7P 106850-38-8P
106850-39-9P 106850-40-2P 106850-41-3P
106850-42-4P 106850-43-5P 106850-45-7P
106850-46-8P 106850-47-9P 106850-48-0P
106850-49-1P 106850-50-4P 106850-51-5P
106850-52-6P 106867-40-7P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)
(preparation of, as antibacterial)

RN 103313-15-1 CAPLUS

CN Imidazo[1,2- α]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxyethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, monosodium salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

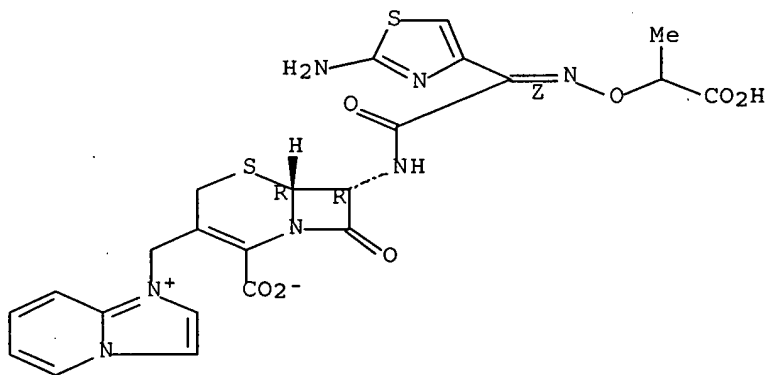
Absolute stereochemistry.
Double bond geometry as shown.



● Na

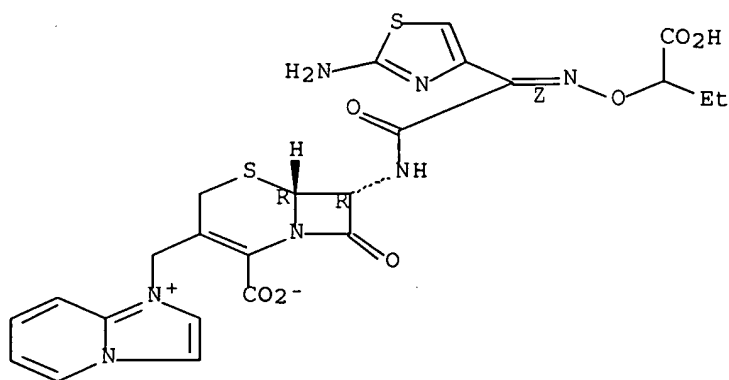
RN 106850-37-7 CAPLUS
 CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxyethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
 Double bond geometry as shown.



RN 106850-38-8 CAPLUS
 CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxypropoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

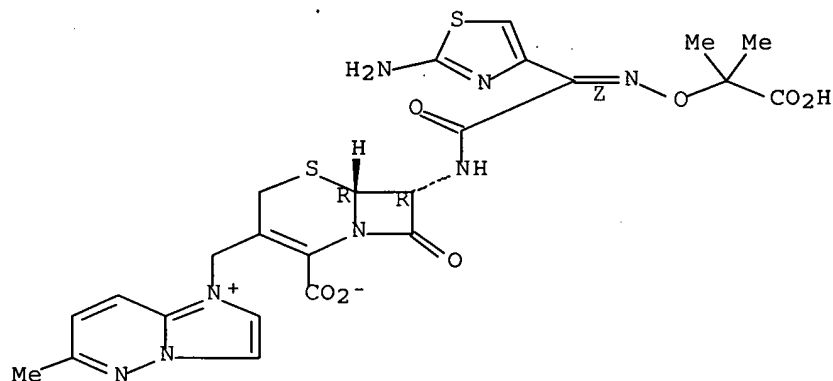
Absolute stereochemistry.
 Double bond geometry as shown.



RN 106850-39-9 CAPLUS

CN Imidazo[1,2-b]pyridazinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-6-methyl-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

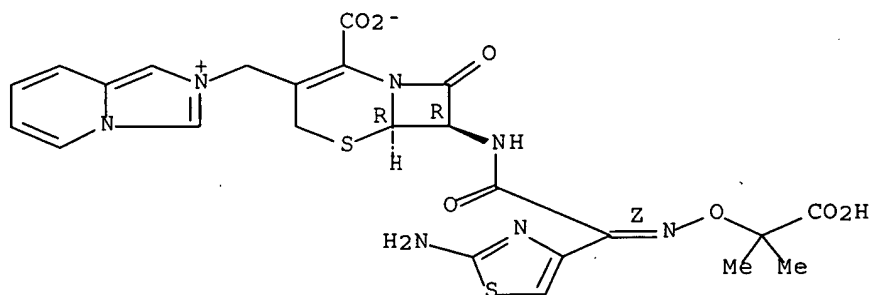
Absolute stereochemistry.
Double bond geometry as shown.



RN 106850-40-2 CAPLUS

CN Imidazo[1,5-a]pyridinium, 2-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

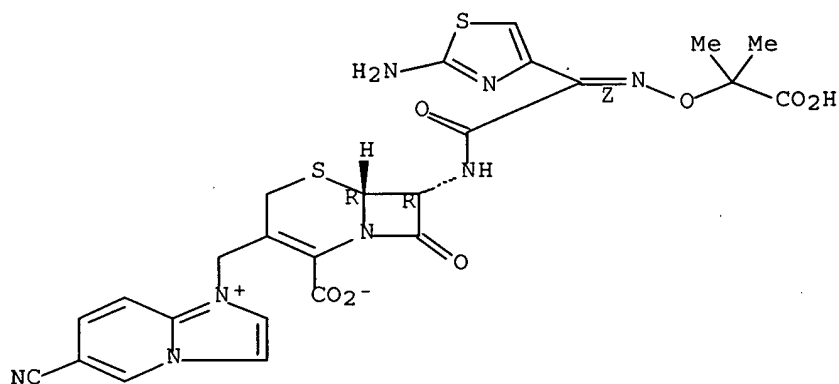
Absolute stereochemistry.
Double bond geometry as shown.



RN 106850-41-3 CAPLUS

CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl)][(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl)methyl]-6-cyano-, inner salt,
[6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

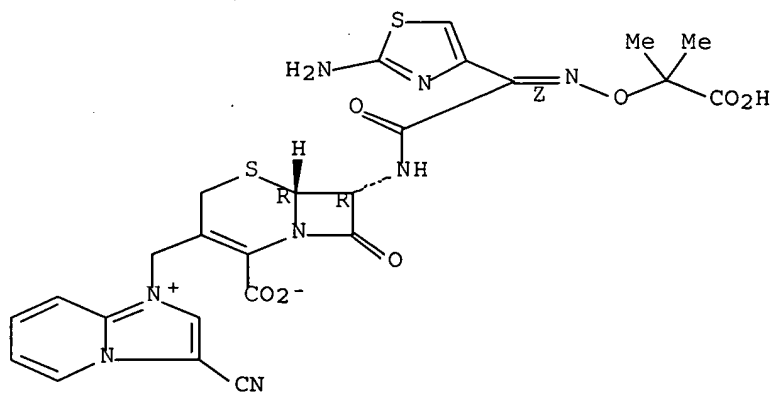
Absolute stereochemistry.
Double bond geometry as shown.



RN 106850-42-4 CAPLUS

CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl)][(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl)methyl]-3-cyano-, inner salt,
[6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

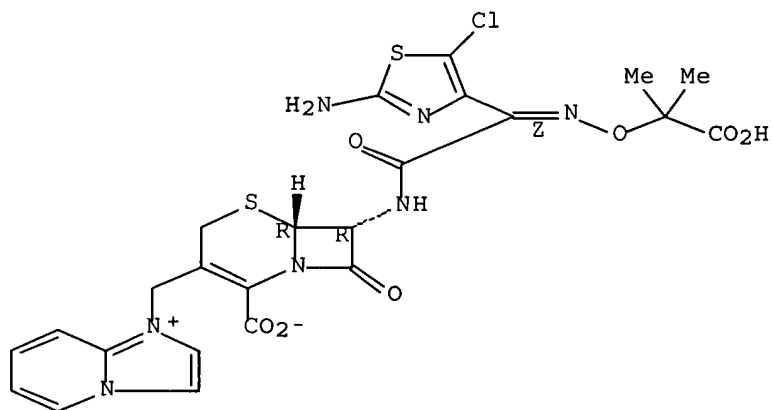


RN 106850-43-5 CAPLUS

CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-5-chloro-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.

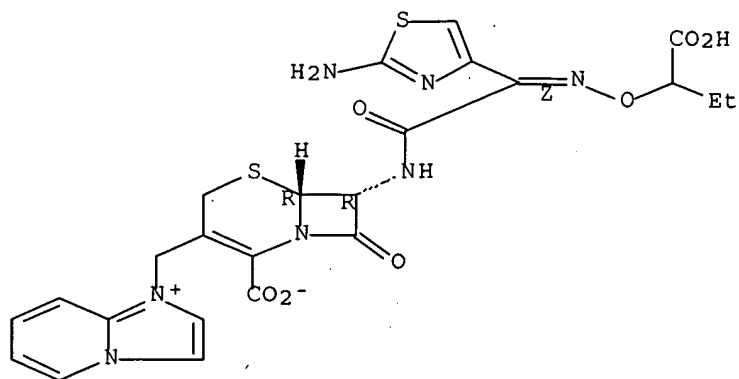


RN 106850-45-7 CAPLUS

CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxypropoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, monosodium salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

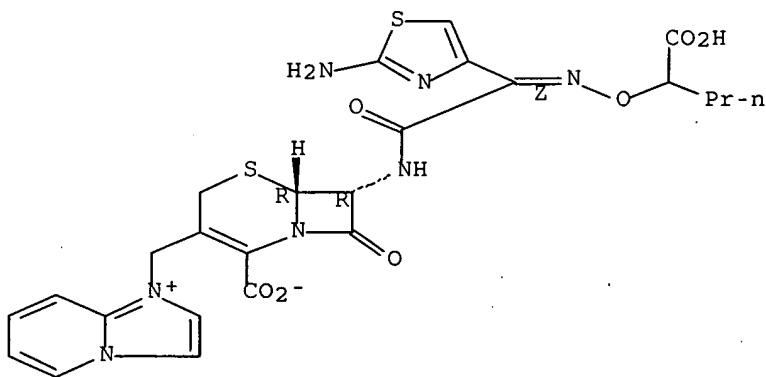
Double bond geometry as shown.



● Na

RN 106850-46-8 CAPLUS
 CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl)][(1-carboxybutoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, monosodium salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
 Double bond geometry as shown.

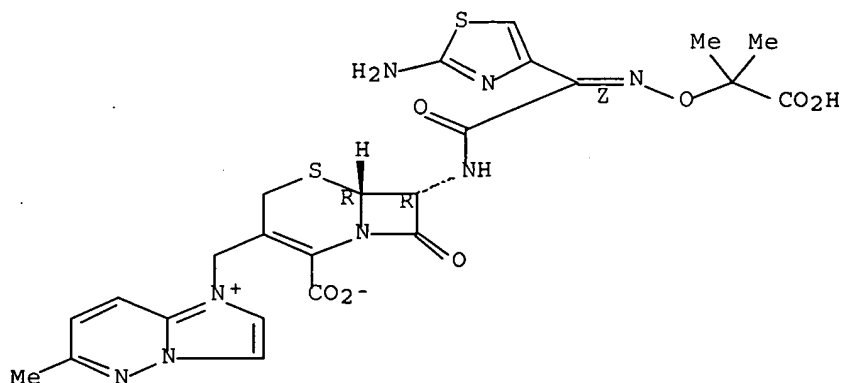


● Na

RN 106850-47-9 CAPLUS
 CN Imidazo[1,2-b]pyridazinium, 1-[[7-[[[(2-amino-4-thiazolyl)][(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-6-methyl-, inner salt, monosodium salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

PAGE 1-A

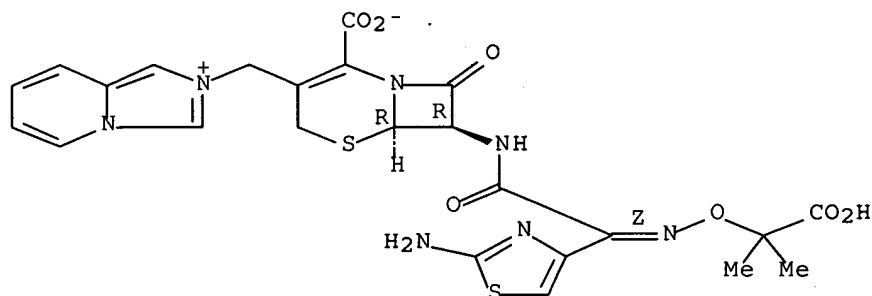


PAGE 2-A

● Na⁺

RN 106850-48-0 CAPLUS
CN Imidazo[1,5-a]pyridinium, 2-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, monosodium salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



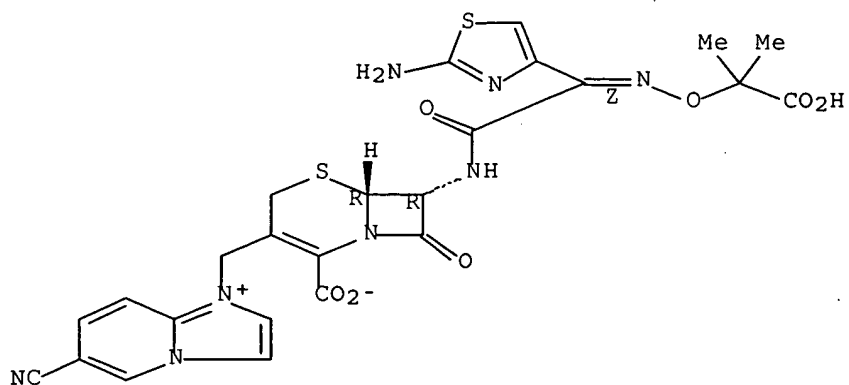
● Na

RN 106850-49-1 CAPLUS
CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-6-cyano-, inner salt, monosodium salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.

PAGE 1-A



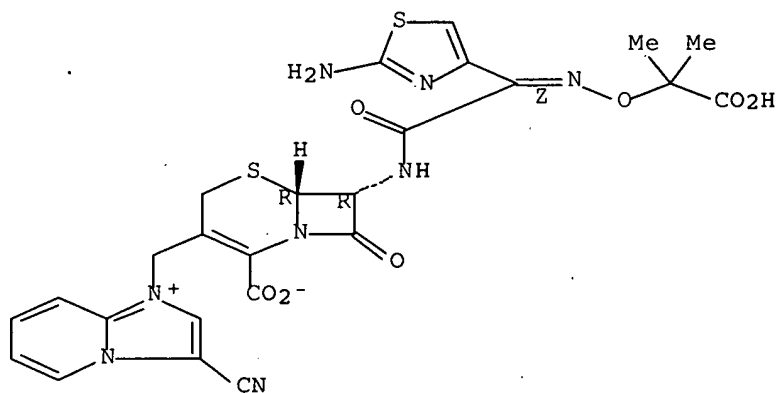
PAGE 2-A

● Na

RN 106850-50-4 CAPLUS
 CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-3-cyano-, inner salt, monosodium salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
 Double bond geometry as shown.

PAGE 1-A



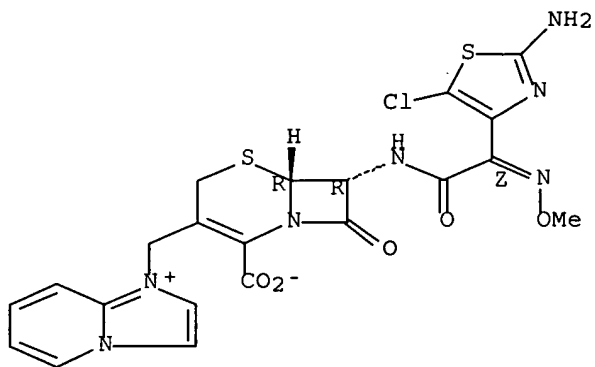
PAGE 2-A

● Na

RN 106850-51-5 CAPLUS
 CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-5-chloro-4-

thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl)methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

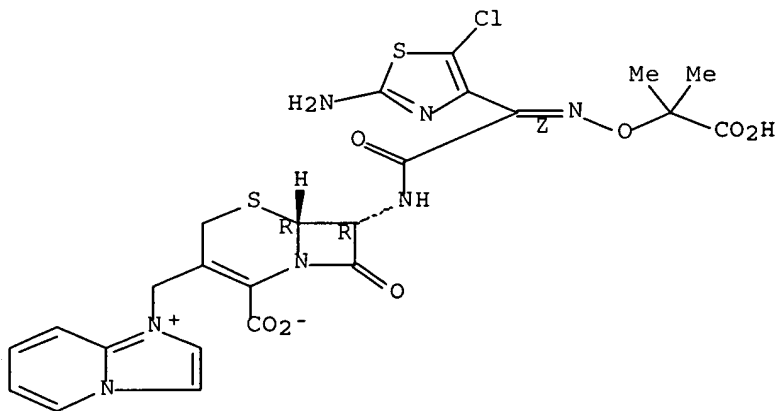
Absolute stereochemistry.
Double bond geometry as shown.



RN 106850-52-6 CAPLUS
CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-5-chloro-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl)methyl]-, inner salt, monosodium salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

PAGE 1-A



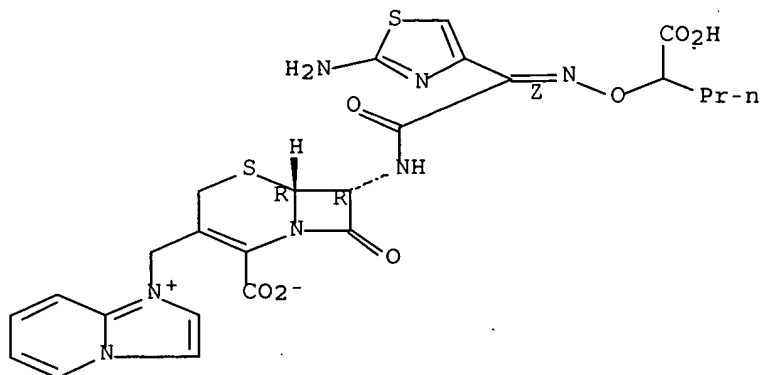
PAGE 2-A

● Na

RN 106867-40-7 CAPLUS
CN Imidazo[1,2-a]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(1-

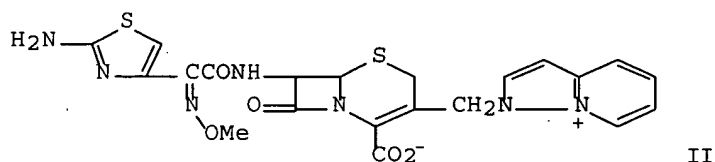
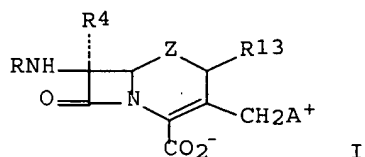
carboxybutoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



L27 ANSWER 8 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN
 ACCESSION NUMBER: 1987:49864 CAPLUS Full-text
 DOCUMENT NUMBER: 106:49864
 TITLE: Antibacterial compounds
 INVENTOR(S): Miyake, Akio; Kondo, Masahiro; Fujino, Masahiko
 PATENT ASSIGNEE(S): Takeda Chemical Industries, Ltd., Japan
 SOURCE: Eur. Pat. Appl., 169 pp.
 CODEN: EPXXDW
 DOCUMENT TYPE: Patent
 LANGUAGE: English
 FAMILY ACC. NUM. COUNT: 2
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 164113	A2	19851211	EP 1985-106979	19850605
EP 164113	A3	19870128		
EP 164113	B1	19900516		
R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE				
WO 8600070	A1	19860103	WO 1984-JP295	19840607
W: MC				
WO 8605787	A1	19861009	WO 1985-JP155	19850401
W: MC				
AT 52783	E	19900615	AT 1985-106979	19850605
CN 85105977	A	19870225	CN 1985-105977	19850807
PRIORITY APPLN. INFO.:				
			WO 1984-JP295	A 19840607
			WO 1985-JP155	A 19850401
			EP 1985-106979	A 19850605
OTHER SOURCE(S): MARPAT 106:49864				
ED Entered STN: 21 Feb 1987				
GI				



AB Cephems I [R = H, N-containing heterocyclyl, acyl, amino-protecting group; Z = S, S(O), O, CH₂; R₄ = H, MeO, HCONH; R₁₃ = H, Me, OH, halo; A = (un)substituted pyrazol-2-yl forming a fused ring at the 1,5 position] or a physiol. or pharmaceutically acceptable salt or ester thereof, useful as antibacterials (no data), were prepared by 2 methods. Successive treatment of 7β-amino-3-(3-oxobutyryloxymethyl)-3-cephem-4-carboxylic acid in THF-H₂O with NaHCO₃ and 2-(2-chloroacetamidothiazol-4-yl)-2(Z)-methoxyiminoacetyl chloride-HCl at 5° give 7β-[2-(2-chloroacetamidothiazol-4-yl)-2(Z)-methoxyiminoacetamido]-3-(3-oxobutyryloxymethyl)-3-cephem-4-carboxylic acid, treatment of which with MeNHCS₂Na gave the 2-(2-aminothiazol-4-yl) analog. This was treated with pyrazolo[1,5-a]pyridine and KI in MeCN-H₂O to give the inner salt 2(Z)-II.

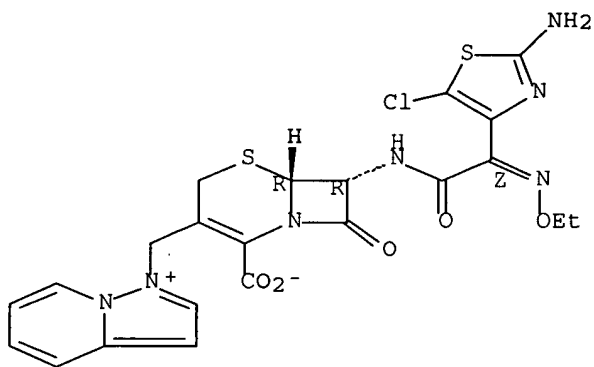
IT 104468-82-8P 104468-84-0P 104468-85-1P

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)
(preparation of, as antibacterial)

RN 104468-82-8 CAPLUS

CN Pyrazolo[1,5-a]pyridinium, 1-[[7-[[[(2-amino-5-chloro-4-thiazolyl)(ethoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6α,7β(Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

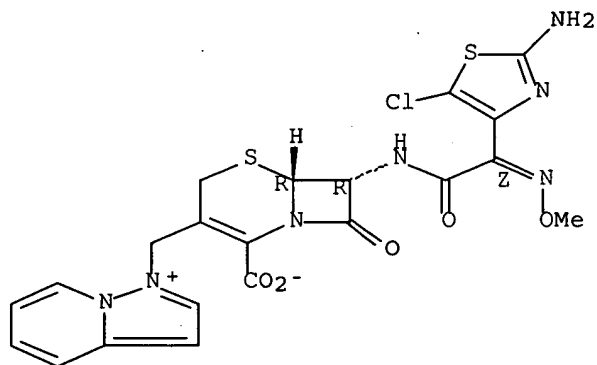


RN 104468-84-0 CAPLUS

CN Pyrazolo[1,5-a]pyridinium, 1-[[7-[[[(2-amino-5-chloro-4-

thiazolyl) (methoxyimino) acetyl] amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl)methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

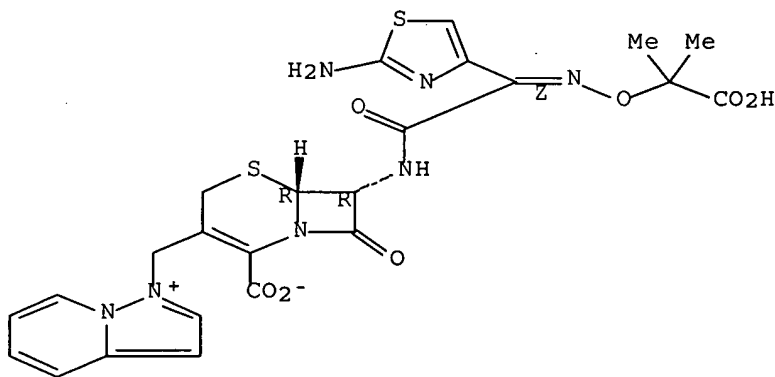
Absolute stereochemistry.
Double bond geometry as shown.



RN 104468-85-1 CAPLUS
CN Pyrazolo[1,5-a]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl) [(1-carboxy-1-methylethoxy) imino] acetyl] amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl)methyl]-, inner salt, monosodium salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

PAGE 1-A



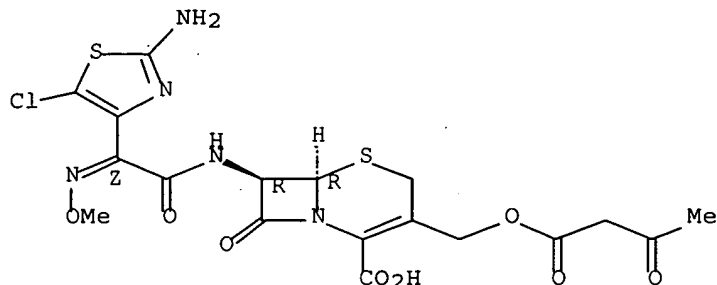
PAGE 2-A

● Na

IT 104468-49-7P 104492-92-4P
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of, as intermediate for cephalosporin antibiotic)
RN 104468-49-7 CAPLUS
CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,

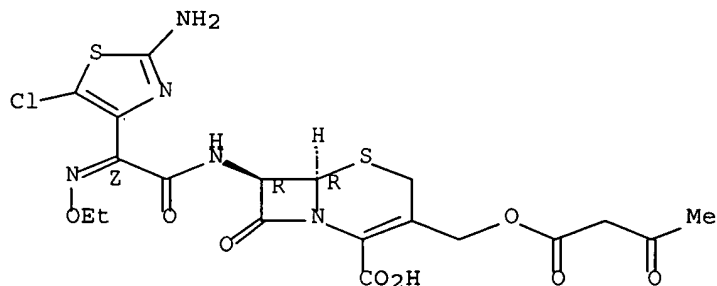
7-[[[(2-amino-5-chloro-4-thiazolyl) (methoxyimino) acetyl] amino]-3-[(1,3-dioxobutoxy)methyl]-8-oxo-, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 104492-92-4 CAPLUS
CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-5-chloro-4-thiazolyl) (ethoxyimino) acetyl] amino]-3-[(1,3-dioxobutoxy)methyl]-8-oxo-, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

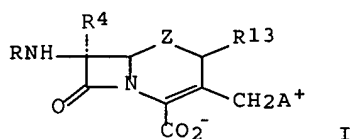
Absolute stereochemistry.
Double bond geometry as shown.



L27 ANSWER 9 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN
ACCESSION NUMBER: 1986:552815 CAPLUS Full-text
DOCUMENT NUMBER: 105:152815
TITLE: Cephem compounds
INVENTOR(S): Miyake, Akio; Kondo, Masahiro; Fujino, Masahiko
PATENT ASSIGNEE(S): Takeda Chemical Industries, Ltd. , Japan
SOURCE: Eur. Pat. Appl., 178 pp.
CODEN: EPXXDW
DOCUMENT TYPE: Patent
LANGUAGE: English
FAMILY ACC. NUM. COUNT: 2
PATENT INFORMATION:

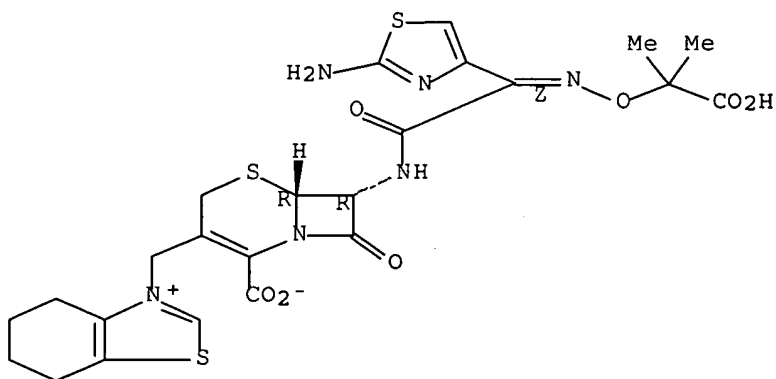
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
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EP 164122	A2	19851211	EP 1985-107013	19850606
EP 164122	A3	19870128		
EP 164122	B1	19900919		
R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE				
WO 8600071	A1	19860103	WO 1984-JP296	19840608
W: MC				
WO 8606376	A1	19861106	WO 1985-JP245	19850430
W: MC				
AT 56719	E	19901015	AT 1985-107013	19850606
CN 85105988	A	19861029	CN 1985-105988	19850808
PRIORITY APPLN. INFO.:			WO 1984-JP296	A 19840608
			WO 1985-JP245	A 19850430
			EP 1985-107013	A 19850606
ED Entered STN: 01 Nov 1986				
GI				



- AB Cephems I [R = N-containing heterocyclyl, acyl, NH₂ protecting group; Z = S, S(O), O, CH₂; R₄ = H, MeO, HCONH; R₁₃ = H, Me, OH, halo; A = (un)substituted 3-thiazolyl forming a fused ring at 4,5] or their physiol. or pharmaceutically acceptable salts or esters, useful as antibacterials (no data), were prepared 7β-[2-[2-(2-Chloroacetamido)-4-thiazolyl-2(Z)-methoxyiminoacetamido]-3-(3-oxobutyryloxymethyl)-3-cephem-4-carboxylic acid in THF-H₂O was treated with MeNHCS₂Na to give 7β-[2-(2-amino-4-thiazolyl-2(Z)-methoxyiminoacetamido)-3-(3-oxobutyryloxymethyl)-3-cephem-4-carboxylic acid which reacted with 4,5,6,7-tetrahydrobenzothiazole and KI in MeCN-H₂O to give 7β-[2-(2-amino-4-thiazolyl-2(Z)-methoxyiminoacetamido)-3-[(4,5,6,7-tetrahydrobenzothiazolio)methyl]-3-cephem-4-carboxylate.
- IT 104082-44-2P 104468-64-6P
 RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)
 (preparation of, as antibacterial)
- RN 104082-44-2 CAPLUS
- CN Benzothiazolium, 3-[[7-[[2-amino-4-thiazolyl][(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-4,5,6,7-tetrahydro-, inner salt, monosodium salt, [6R-[6α,7β(Z)]]- (9CI) (CA INDEX NAME)

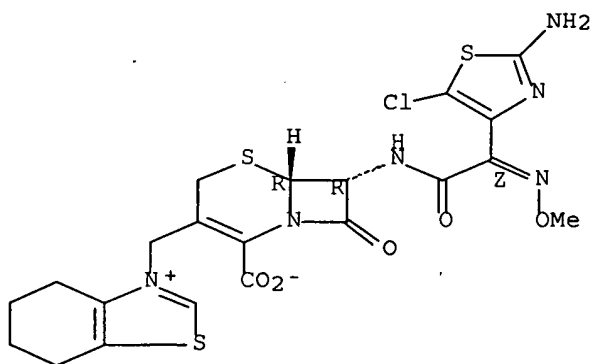
Absolute stereochemistry.
 Double bond geometry as shown.



● Na

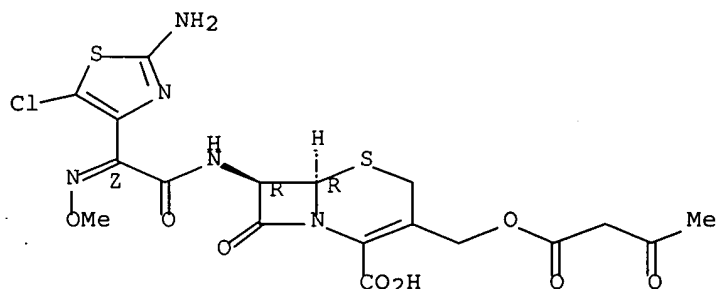
RN 104468-64-6 CAPLUS
 CN Benzothiazolium, 3-[[[7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-4,5,6,7-tetrahydro-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
 Double bond geometry as shown.



IT 104468-49-7P
 RL: SPN (Synthetic preparation); PREP (Preparation)
 (preparation of, as cephalosporin intermediate)
 RN 104468-49-7 CAPLUS
 CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
 7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-3-[(1,3-dioxobutoxy)methyl]-8-oxo-, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
 Double bond geometry as shown.



L27 ANSWER 10 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 1986:68672 CAPLUS Full-text

DOCUMENT NUMBER: 104:68672

TITLE: Cephalosporin derivatives

INVENTOR(S): Lattrell, Rudolf; Blumbach, Juergen; Duerckheimer, Walter; Schwab, Wilfried; Seibert, Gerhard

PATENT ASSIGNEE(S): Hoechst A.-G. , Fed. Rep. Ger.

SOURCE: Ger. Offen., 28 pp.

CODEN: GWXXBX

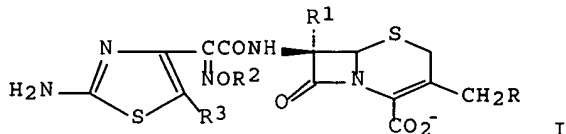
DOCUMENT TYPE: Patent

LANGUAGE: German

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 3336757	A1	19850425	DE 1983-3336757	19831008
EP 137441	A2	19850417	EP 1984-111745	19841002
EP 137441	A3	19860115		
R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE				
DK 8404799	A	19850409	DK 1984-4799	19841005
JP 60097982	A2	19850531	JP 1984-211207	19841008
PRIORITY APPLN. INFO.:			DE 1983-3336757	A 19831008
OTHER SOURCE(S):	CASREACT 104:68672			
ED	Entered STN: 08 Mar 1986			
GI				



AB Cephalosporins I [R = heterocyclic quaternary ammonium; R1 = H, OMe; R2 = H, (un)substituted alkyl, cycloalkyl; R3 = H, halo] were prepared. Thus, 0.15 g I (R = thiazolyl, R1 = R3 = H, R2 = Me) was obtained by treating 0.68 g of the acetoxymethylcephem with 1.3 g thiazole in the presence of KI.

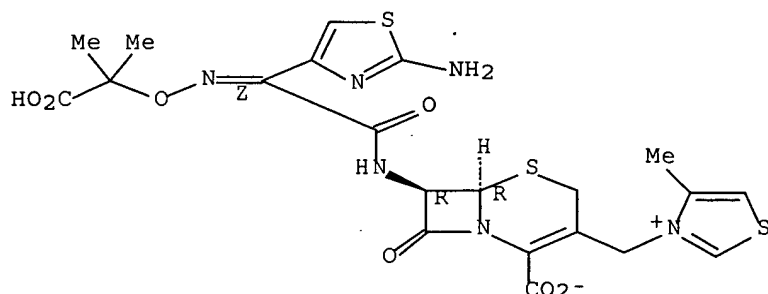
IT 97547-09-6P 97900-17-9P 97919-00-1P

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 97547-09-6 CAPLUS

CN Thiazolium, 3-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-4-methyl-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

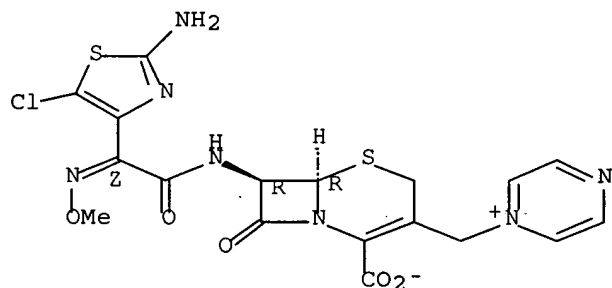
Absolute stereochemistry.
Double bond geometry as shown.



RN 97900-17-9 CAPLUS

CN Pyrazinium, 1-[[7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

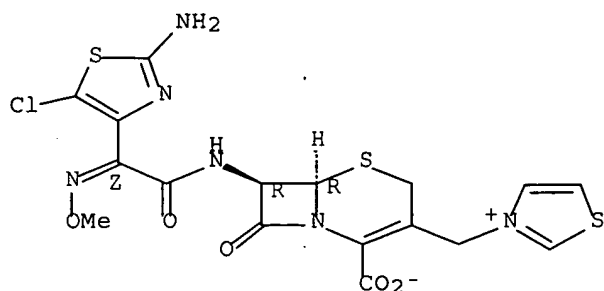
Absolute stereochemistry.
Double bond geometry as shown.



RN 97919-00-1 CAPLUS

CN Thiazolium, 3-[[7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



IT 71445-31-3

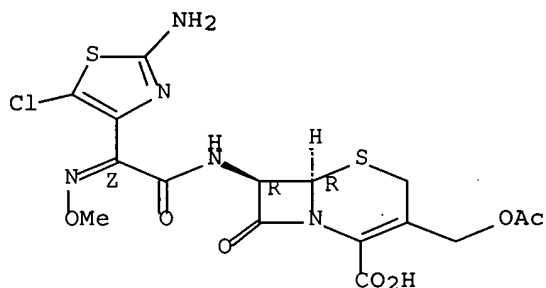
RL: RCT (Reactant); RACT (Reactant or reagent)
(reaction of, with nitrogen heterocycles)

RN 71445-31-3 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
3-[(acetyloxy)methyl]-7-[[[(2Z)-(2-amino-5-chloro-4-
thiazolyl)(methoxyimino)acetyl]amino]-8-oxo-, (6R,7R)- (9CI) (CA INDEX
NAME)

Absolute stereochemistry.

Double bond geometry as shown.



L27 ANSWER 11 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 1985:615071 CAPLUS Full-text

DOCUMENT NUMBER: 103:215071

TITLE: Cephalosporin derivatives

INVENTOR(S): Fleischmann, Klaus; Duerckheimer, Walter; Lattrell, Rudolf; Schwab, Wilfried; Seeger, Karl.

PATENT ASSIGNEE(S) : Hoechst A.-G. , Fed. Rep. Ger.

SOURCE: Ger. Offen. 39 pp.

CODEN: GWXXBX

DOCUMENT TYPE: Patent

LANGUAGE: German

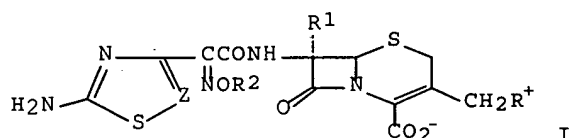
FAMILY ACC. NUM. COUNT: 2

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 3409431	A1	19850418	DE 1984-3409431	19840315
EP 137440	A2	19850417	EP 1984-111744	19841002
EP 137440	A3	19860108		

R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE

HU 37152	O	19851128	HU 1984-3726	19841002
HU 37152	A2	19851128		
HU 190878	B	19861128		
DK 8404796	A	19850409	DK 1984-4796	19841005
FI 8403933	A	19850409	FI 1984-3933	19841005
NO 8404006	A	19850409	NO 1984-4006	19841005
AU 8433883	A1	19850418	AU 1984-33883	19841005
ZA 8407825	A	19850529	ZA 1984-7825	19841005
ES 536550	A1	19851216	ES 1984-536550	19841005
JP 60097983	A2	19850531	JP 1984-211208	19841008
PRIORITY APPLN. INFO.:			DE 1983-3336756	A1 19831008
			DE 1984-3409431	A 19840315
ED Entered STN: 28 Dec 1985				
GI				



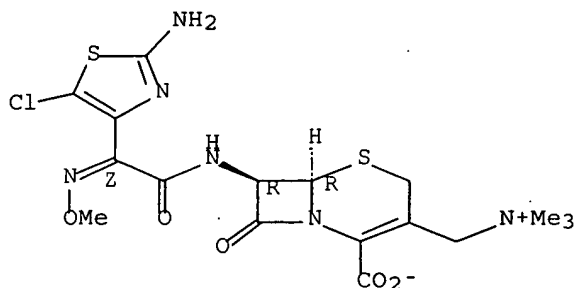
AB Cephalosporins I [Z = CH, CF, CCl, CBr, N; R = tertiary amine; R1 = H, OMe; R2 = H, (un)substituted alkyl, cycloalkyl] were prepared. Thus, I (Z = CH, R = NEt3, R1 = H, R2 = Me) was obtained in 39.5% yield by iodinating the acetoxymethylcephem with CF3CONMeSiMe3 and Me3SiI and treating the iodomethylcephem with NEt3.

IT 98355-78-3P 98355-79-4P 98355-80-7P
98355-81-8P 98355-84-1P 98355-86-3P
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 98355-78-3 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-3-methanaminium, 7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-N,N,N-trimethyl-8-oxo-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

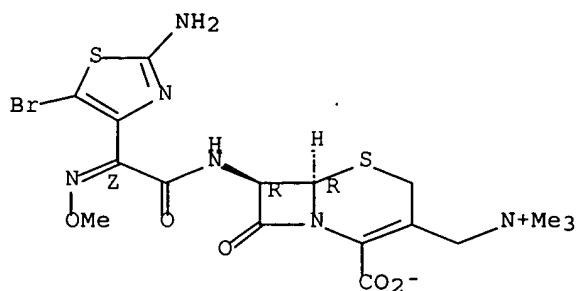


RN 98355-79-4 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-3-methanaminium, 7-[[[(2-amino-5-bromo-

4-thiazolyl) (methoxyimino) acetyl] amino] -2-carboxy-N,N,N-trimethyl-8-oxo-,
inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

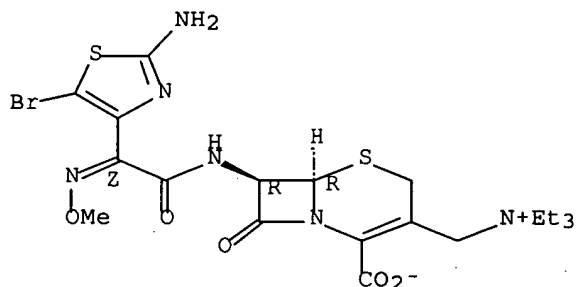
Absolute stereochemistry.
Double bond geometry as shown.



RN 98355-80-7 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-3-methanaminium, 7-[[[(2-amino-5-bromo-4-thiazolyl) (methoxyimino) acetyl] amino] -2-carboxy-N,N,N-triethyl-8-oxo-,
inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

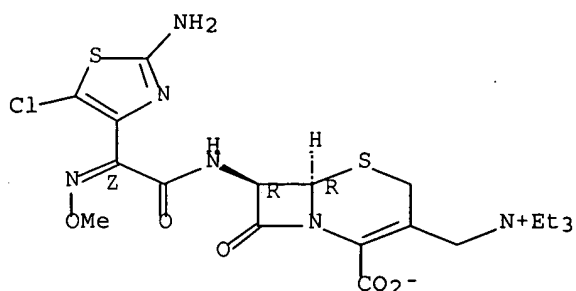
Absolute stereochemistry.
Double bond geometry as shown.



RN 98355-81-8 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-3-methanaminium, 7-[[[(2-amino-5-chloro-4-thiazolyl) (methoxyimino) acetyl] amino] -2-carboxy-N,N,N-triethyl-8-oxo-,
inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

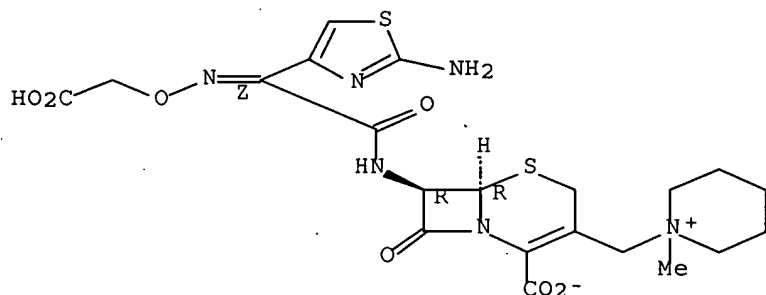
Absolute stereochemistry.
Double bond geometry as shown.



RN 98355-84-1 CAPLUS

CN Piperidinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-1-methyl-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

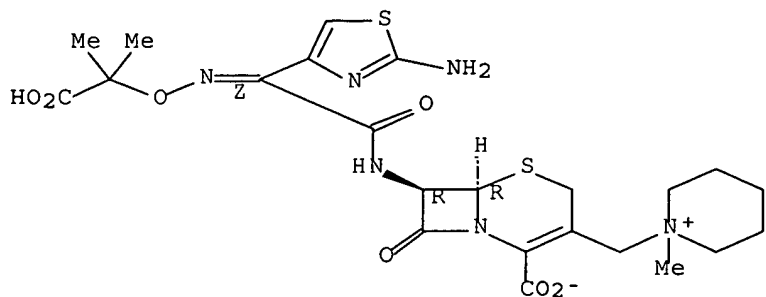
Absolute stereochemistry.
Double bond geometry as shown.



RN 98355-86-3 CAPLUS

CN Piperidinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-1-methyl-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

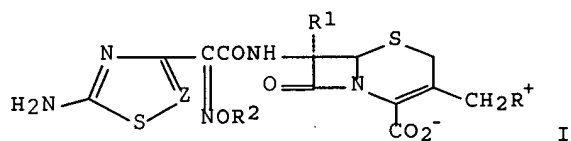
Absolute stereochemistry.
Double bond geometry as shown.



ACCESSION NUMBER: 1985:560295 CAPLUS Full-text
 DOCUMENT NUMBER: 103:160295
 TITLE: Cephalosporin derivatives
 INVENTOR(S): Fleischmann, Klaus; Duerckheimer, Walter; Lattrell, Rudolf; Schwab, Wilfried; Seeger, Karl
 PATENT ASSIGNEE(S): Hoechst A.-G. , Fed. Rep. Ger.
 SOURCE: Eur. Pat. Appl., 43 pp.
 CODEN: EPXXDW
 DOCUMENT TYPE: Patent
 LANGUAGE: German
 FAMILY ACC. NUM. COUNT: 2
 PATENT INFORMATION:

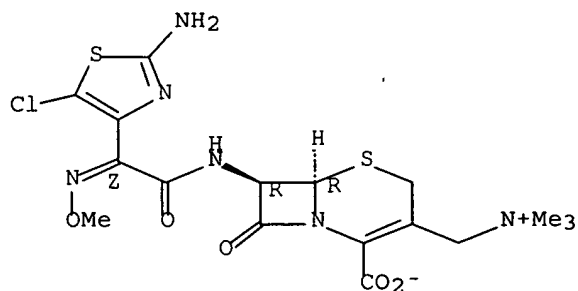
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 137440	A2	19850417	EP 1984-111744	19841002
EP 137440	A3	19860108		
R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE				
DE 3409431	A1	19850418	DE 1984-3409431	19840315
PRIORITY APPLN. INFO.:			DE 1983-3336756	A 19831008
			DE 1984-3409431	A 19840315

OTHER SOURCE(S): MARPAT 103:160295
 ED Entered STN: 16 Nov 1985
 GI



AB Cephalosporins I [Z = CH, CF, CCl, CBr, N; R = tertiary amino; R1 = H, OMe; R2 = H, (un)substituted alkyl, cycloalkyl] were prepared Thus, I (Z = CH, R = NEt3, R1 = H, R2 = Me) was prepared by treating the 3-acetoxymethylcephem with NEt3.
 IT 98355-78-3P 98355-79-4P 98355-80-7P
 98355-81-8P 98355-84-1P 98355-86-3P
 RL: SPN (Synthetic preparation); PREP (Preparation)
 (preparation of)
 RN 98355-78-3 CAPLUS
 CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-3-methanaminium, 7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-N,N,N-trimethyl-8-oxo-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

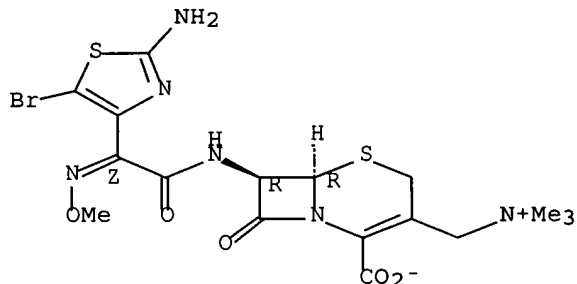
Absolute stereochemistry.
 Double bond geometry as shown.



RN 98355-79-4 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-3-methanaminium, 7-[[[(2-amino-5-bromo-4-thiazolyl) (methoxyimino) acetyl] amino] -2-carboxy-N,N,N-trimethyl-8-oxo-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

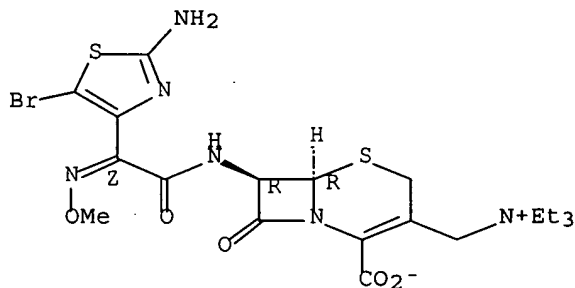
Absolute stereochemistry.
Double bond geometry as shown.



RN 98355-80-7 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-3-methanaminium, 7-[[[(2-amino-5-bromo-4-thiazolyl) (methoxyimino) acetyl] amino] -2-carboxy-N,N,N-triethyl-8-oxo-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

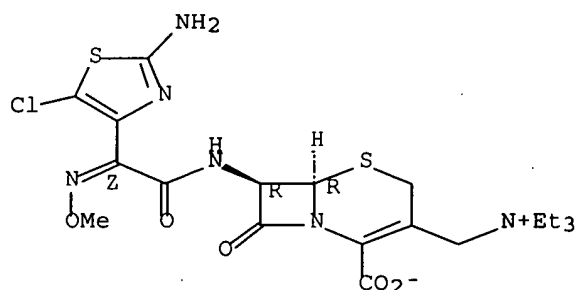


RN 98355-81-8 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-3-methanaminium, 7-[[[(2-amino-5-chloro-4-thiazolyl) (methoxyimino) acetyl] amino] -2-carboxy-N,N,N-triethyl-8-oxo-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

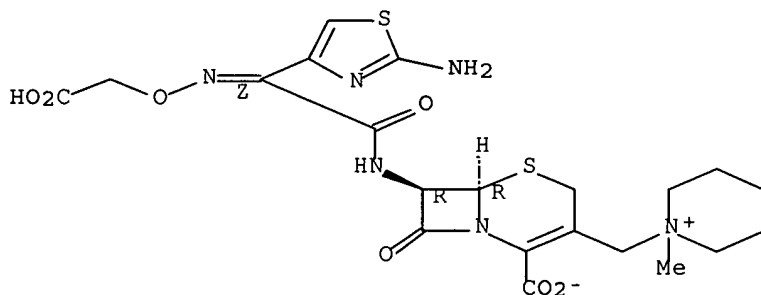
Absolute stereochemistry.
Double bond geometry as shown.



RN 98355-84-1 CAPLUS

CN Piperidinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-1-methyl-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

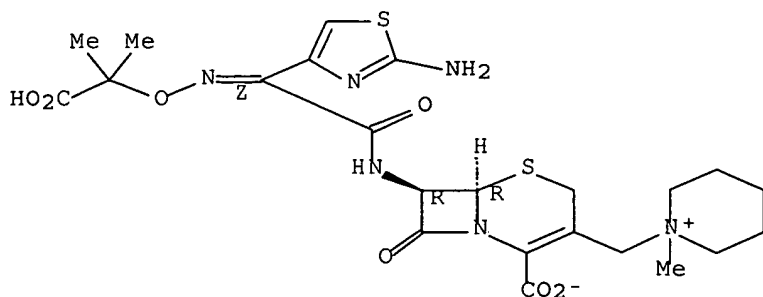
Absolute stereochemistry.
Double bond geometry as shown.



RN 98355-86-3 CAPLUS

CN Piperidinium, 1-[[7-[[[(2-amino-4-thiazolyl)[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-1-methyl-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

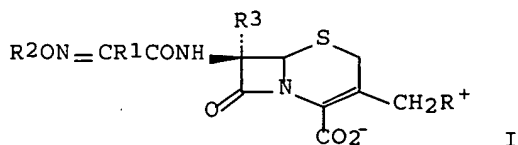
Absolute stereochemistry.
Double bond geometry as shown.



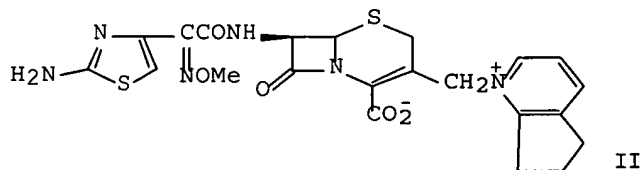
L27 ANSWER 13 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN
ACCESSION NUMBER: 1985:113173 CAPLUS Full-text
DOCUMENT NUMBER: 102:113173
TITLE: Cephem compounds
INVENTOR(S): Kirrstetter, Reiner; Duerckheimer, Walter; Lattrell,
Rudolf; Schwab, Wilfried
PATENT ASSIGNEE(S): Hoechst A.-G. , Fed. Rep. Ger.
SOURCE: Ger. Offen., 29 pp.
CODEN: GWXXBX
DOCUMENT TYPE: Patent
LANGUAGE: German
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 3316797	A1	19841108	DE 1983-3316797	19830507
HU 34507	A2	19850328	HU 1984-1703	19840502
HU 192984	B	19870828		
FI 8401765	A	19841108	FI 1984-1765	19840503
FI 82056	B	19900928		
FI 82056	C	19910110		
AU 8427706	A1	19841108	AU 1984-27706	19840504
AU 575826	B2	19880811		
DK 8402243	A	19841108	DK 1984-2243	19840504
DK 165836	B	19930125		
DK 165836	C	19930621		
NO 8401793	A	19841108	NO 1984-1793	19840504
EP 125576	A2	19841121	EP 1984-105024	19840504
EP 125576	A3	19851016		
EP 125576	B1	19890419		
R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE				
ES 532176	A1	19841216	ES 1984-532176	19840504
ZA 8403339	A	19841224	ZA 1984-3339	19840504
DD 219195	A5	19850227	DD 1984-262710	19840504
CS 247080	B2	19861113	CS 1984-3302	19840504
CA 1224458	A1	19870721	CA 1984-453604	19840504
AT 42296	E	19890515	AT 1984-105024	19840504
IL 71772	A1	19881130	IL 1984-71772	19840506
JP 60034973	A2	19850222	JP 1984-90843	19840507
JP 07023379	B4	19950315		
US 4692516	A	19870908	US 1984-607593	19840507
PRIORITY APPLN. INFO.:			DE 1983-3316797	A 19830507
			EP 1984-105024	A 19840504
OTHER SOURCE(S):		CASREACT 102:113173		

ED Entered STN: 06 Apr 1985
GI



I



II

AB Pyridiniummethylcephems I [R = (un)substituted quinoline, isoquinoline, pyridine, cycloalkapyridine; R1 = aminothiazolyl, amino-1,2,4-thiadiazolyl; R2 = H, (un)substituted alkyl, cycloalkyl; R3 = H, OMe] were prepared Thus II was obtained in 69% yield by treating the acetoxymethylcephem with cyclopentapyridine in the presence of Me3SiI and KI.

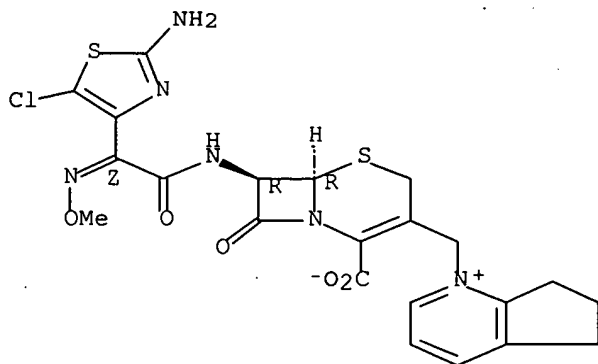
IT 84982-50-3P 95055-25-7P

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 84982-50-3 CAPLUS

CN 5H-Cyclopenta[b]pyridinium, 1-[[7-[[[(2-amino-5-chloro-4-thiazolyl) (methoxyimino) acetyl] amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-6,7-dihydro-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

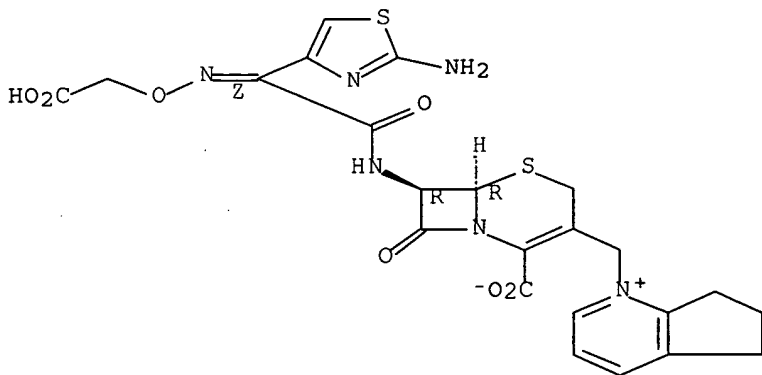


RN 95055-25-7 CAPLUS

CN 5H-Cyclopenta[b]pyridinium, 1-[[7-[[[(2-amino-4-thiazolyl) [(carboxymethoxy) imino] acetyl] amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-6,7-dihydro-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.



IT 71445-31-3

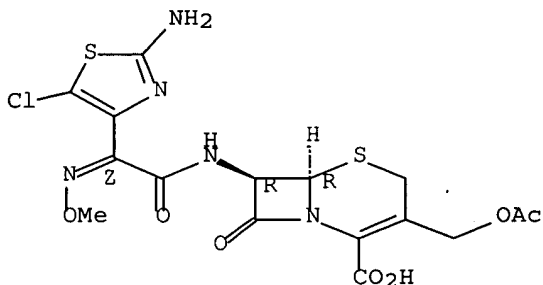
RL: RCT (Reactant); RACT (Reactant or reagent)
(reaction of, with cyclopentapyridine)

RN 71445-31-3 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
3-[(acetyloxy)methyl]-7-[[(2Z)-(2-amino-5-chloro-4-
thiazolyl)(methoxyimino)acetyl]amino]-8-oxo-, (6R,7R)- (9CI) (CA INDEX
NAME)

Absolute stereochemistry.

Double bond geometry as shown.



L27 ANSWER 14 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN

ACCESSION NUMBER: 1985:24353 CAPLUS Full-text

DOCUMENT NUMBER: 102:24353

TITLE: Cephalosporins and their use

INVENTOR(S): Sadaki, Hiroshi; Imaizumi, Hiroyuki; Nagai, Takashi;
Takeda, Kenji; Myokan, Isao; Inaba, Takihiro;
Watanabe, Yasuo; Fukuoka, Yoshikazu; Minami,
Shinzaburo; Saikawa, Isamu

PATENT ASSIGNEE(S) : Toyama Chemical Co., Ltd. , Japan

SOURCE: Ger. Offen., 252 pp.

CODEN: GWXXBX

DOCUMENT TYPE: Patent

LANGUAGE : German

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 3341591	A1	19840517	DE 1983-3341591	19831117
DE 3341591	C2	19880407		
JP 59093085	A2	19840529	JP 1982-200382	19821117
JP 03057913	B4	19910903		
JP 59193893	A2	19841102	JP 1983-67871	19830419
JP 04054676	B4	19920831		
JP 60092293	A2	19850523	JP 1983-199945	19831027
JP 05027637	B4	19930421		
DK 8305218	A	19840518	DK 1983-5218	19831115
FI 8304183	A	19840518	FI 1983-4183	19831115
FI 75827	B	19880429		
FI 75827	C	19880808		
GB 2131800	A1	19840627	GB 1983-30599	19831116
GB 2131800	B2	19860709		
AU 8321429	A1	19850523	AU 1983-21429	19831116
AU 549861	B2	19860220		
ES 527333	A1	19851201	ES 1983-527333	19831116
ES 527333	A5	19851231		
CH 657135	A	19860815	CH 1983-6165	19831116
US 4618606	A	19861021	US 1983-552468	19831116
CH 660010	A	19870313	CH 1986-1315	19831116
CA 1253486	A1	19890502	CA 1983-441286	19831116
BE 898249	A1	19840516	BE 1983-211891	19831117
FR 2536074	A1	19840518	FR 1983-18293	19831117
FR 2536074	B1	19860905		
NL 8303955	A	19840618	NL 1983-3955	19831117
NL 192792	B	19971001		
NL 192792	C	19980203		
DE 3347928	C2	19930506	DE 1983-3347928	19831117
ES 544723	A1	19860516	ES 1985-544723	19850628
ES 544724	A1	19860516	ES 1985-544724	19850628
AU 8547421	A1	19860102	AU 1985-47421	19850912
AU 565648	B2	19870924		
GB 2171697	A1	19860903	GB 1986-3333	19860211
GB 2171697	B2	19870701		
CA 1276139	A2	19901113	CA 1986-504319	19860317
US 4717767	A	19880105	US 1986-860317	19860722

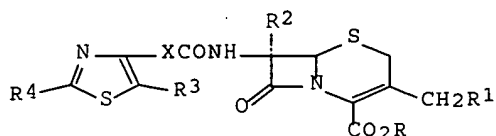
PRIORITY APPLN. INFO.:

JP 1982-200382	A	19821117
JP 1983-67871	A	19830419
JP 1983-199945	A	19831027
CA 1983-441286	A3	19831116
CH 1983-6165	A	19831116
GB 1983-30599	A3	19831116
US 1983-552468	A3	19831116

OTHER SOURCE(S): CASREACT 102:24353; MARPAT 102:24353

ED Entered STN: 26 Jan 1985

GI



AB Cephalosporins I [X = CH₂, (un)substituted C:NOH; R = H, protective group; R₁ = (un)substituted (di)oxopyrazinyl, (di)oxopyridazinyl; R₂ = H, alkoxy; R₃ = H, halogen; R₄ = H, (un)protected NH₂] were prepared. Thus (EtO)₂CHCH₂NHCOCO₂Et was amidated to give (EtO)₂CHCH₂NHCOCONH₂ which was cyclized with acid to give 4-ethyl-1,2,3,4-tetrahydropyrazine-2,3-dione (II). 7-Aminocephalosporanic acid was treated with II to give the pyrazinylmethylcephem which was esterified and acylated to give I [R = CHPh₂, R₁ = 4-ethyl-2,3-dioxo-1,2,3,4-tetrahydropyrazin-1-yl (Q), R₂ = R₃ = H, R₄ = NHCHO, X = C:NOH, III). Deformylation and ester hydrolysis of III gave I.CF₃CO₂H (R = R₂ = R₃ = H, R₁ = Q, R₄ = NH₂, X = C:NOH) which had min. inhibitory concns. against a series of gram-neg. organisms of ≤0.1 µg/mL.

IT 92732-91-7P 92732-94-0P 92732-95-1P
92732-96-2P 92732-97-3P 92732-98-4P
92733-03-4P 92733-04-5P 92733-05-6P
92733-06-7P 92733-37-4P

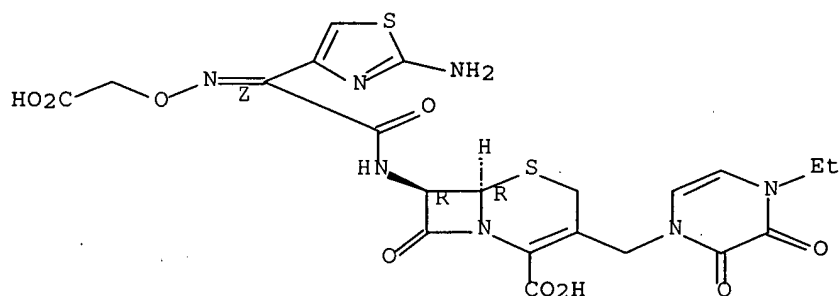
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); SPN (Synthetic preparation); BIOL (Biological study); PREP (Preparation)

(preparation and bactericidal activity of)

RN 92732-91-7 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-3-[(4-ethyl-3,4-dihydro-2,3-dioxo-1(2H)-pyrazinyl)methyl]-8-oxo-, [6R-[6α,7β(Z)]]- (9CI) (CA INDEX NAME)

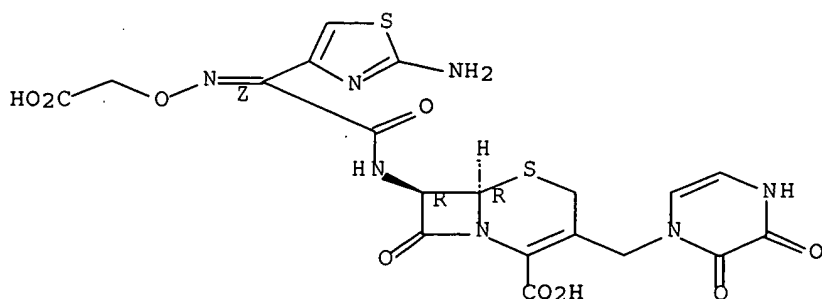
Absolute stereochemistry.
Double bond geometry as shown.



RN 92732-94-0 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-3-[(3,4-dihydro-2,3-dioxo-1(2H)-pyrazinyl)methyl]-8-oxo-, [6R-[6α,7β(Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.

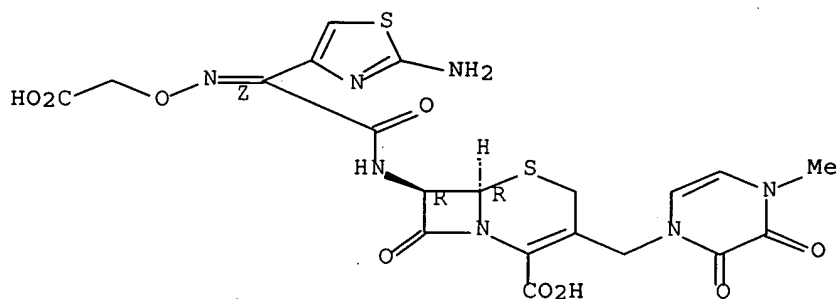


RN 92732-95-1 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-3-[(3,4-
dihydro-4-methyl-2,3-dioxo-1(2H)-pyrazinyl)methyl]-8-oxo-,
[6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.



RN 92732-96-2 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-3-[(3,4-
dihydro-2,3-dioxo-1(2H)-pyrazinyl)methyl]-8-oxo-, [6R-
[6 α ,7 β (Z)]]-, mono(trifluoroacetate) (9CI) (CA INDEX NAME)

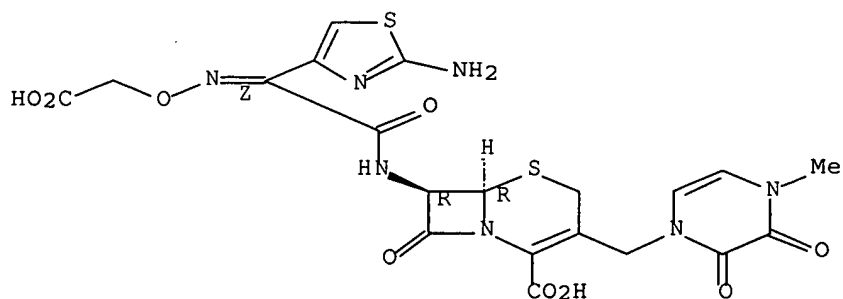
CM 1

CRN 92732-95-1

CMF C20 H19 N7 O9 S2

Absolute stereochemistry.

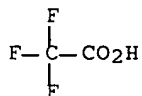
Double bond geometry as shown.



CM 2

CRN 76-05-1

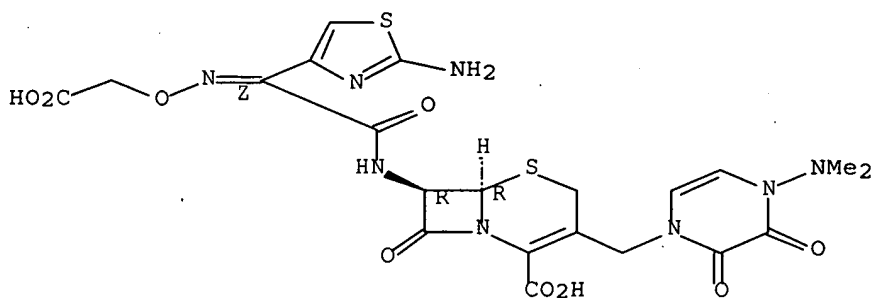
CMF C2 H F3 O2



RN 92732-97-3 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl) [(carboxymethoxy) imino] acetyl] amino]-3-[[4-(dimethylamino)-3,4-dihydro-2,3-dioxo-1(2H)-pyrazinyl]methyl]-8-oxo-,
[6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 92732-98-4 CAPLUS

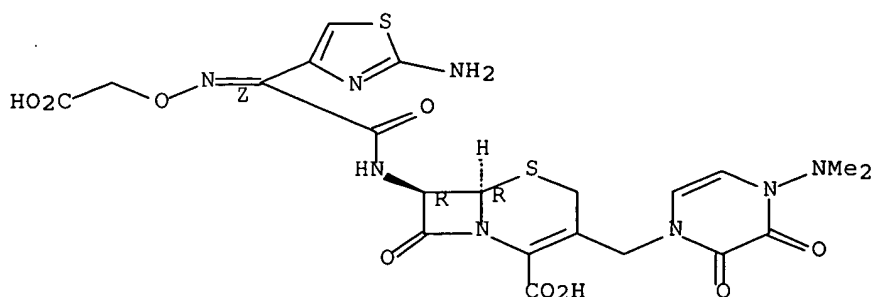
CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl) [(carboxymethoxy) imino] acetyl] amino]-3-[[4-(dimethylamino)-3,4-dihydro-2,3-dioxo-1(2H)-pyrazinyl]methyl]-8-oxo-,
[6R-[6 α ,7 β (Z)]]-, mono(trifluoroacetate) (9CI) (CA INDEX NAME)

CM 1

CRN 92732-97-3

CMF C21 H22 N8 O9 S2

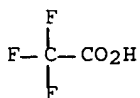
Absolute stereochemistry.
Double bond geometry as shown.



CM 2

CRN 76-05-1

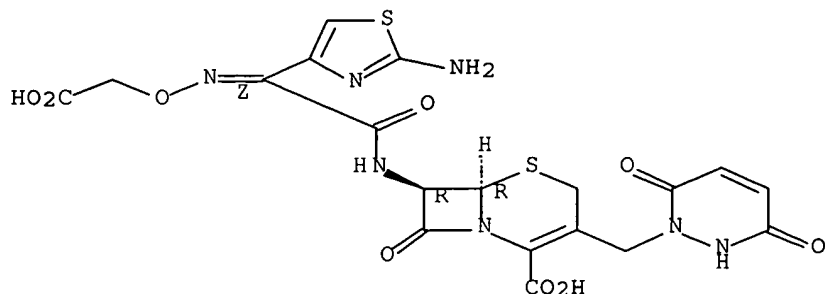
CMF C2 H F3 O2



RN 92733-03-4 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-3-[(3,6-dihydro-3,6-dioxo-1(2H)-pyridazinyl)methyl]-8-oxo-, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 92733-04-5 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-3-[(3,6-dihydro-3,6-dioxo-1(2H)-pyridazinyl)methyl]-8-oxo-, [6R-

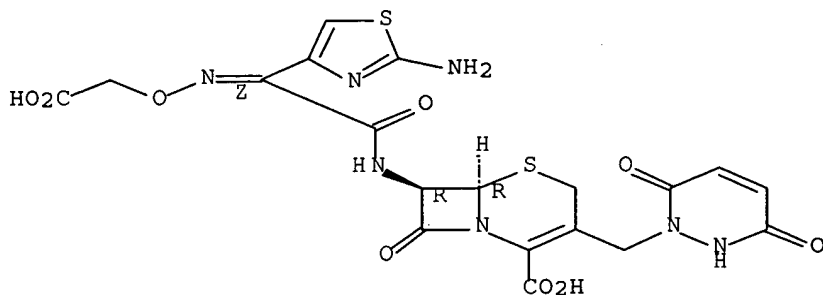
[6 α ,7 β (Z)]-, monoformate (9CI) (CA INDEX NAME)

CM 1

CRN 92733-03-4

CMF C19 H17 N7 O9 S2

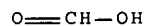
Absolute stereochemistry.
Double bond geometry as shown.



CM 2

CRN 64-18-6

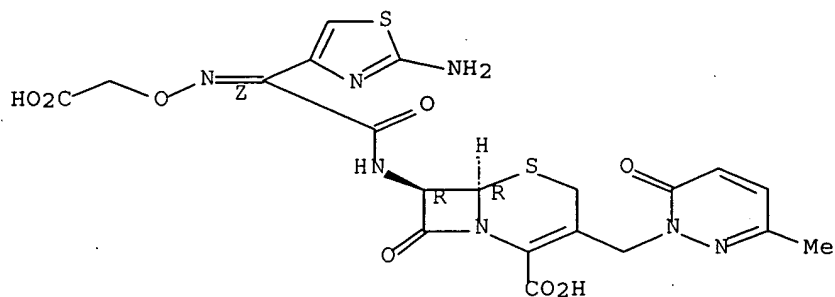
CMF C H2 O2



RN 92733-05-6 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-3-[(3-methyl-
6-oxo-1(6H)-pyridazinyl)methyl]-8-oxo-, [6R-[6 α ,7 β (Z)]]- (9CI)
(CA INDEX NAME)

Absolute stereochemistry.
Double bond geometry as shown.



RN 92733-06-7 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,

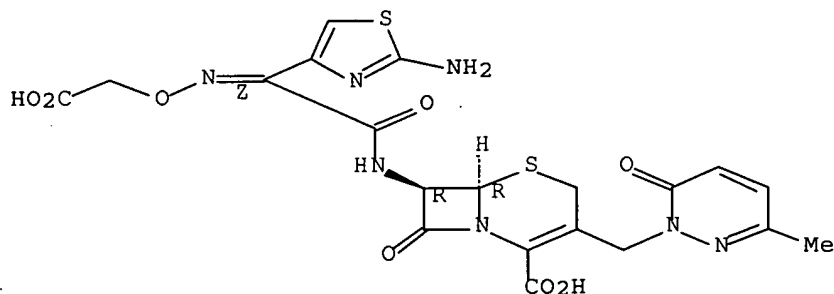
7-[[(2-amino-4-thiazolyl) [(carboxymethoxy) imino] acetyl] amino] -3- [(3-methyl-6-oxo-1(6H)-pyridazinyl)methyl] -8-oxo-, [6R-[6 α ,7 β (Z)]]-,
monoformate (9CI) (CA INDEX NAME)

CM 1

CRN 92733-05-6

CMF C20 H19 N7 O8 S2

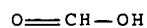
Absolute stereochemistry.
Double bond geometry as shown.



CM 2

CRN 64-18-6

CMF C H2 O2



RN 92733-37-4 CAPLUS

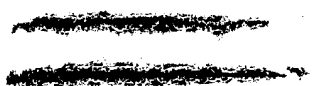
CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[(2-amino-4-thiazolyl) [(carboxymethoxy) imino] acetyl] amino] -3- [(4-ethyl-3,4-dihydro-2,3-dioxo-1(2H)-pyrazinyl)methyl] -8-oxo-, [6R-[6 α ,7 β (Z)]]-, mono(trifluoroacetate) (9CI) (CA INDEX NAME)

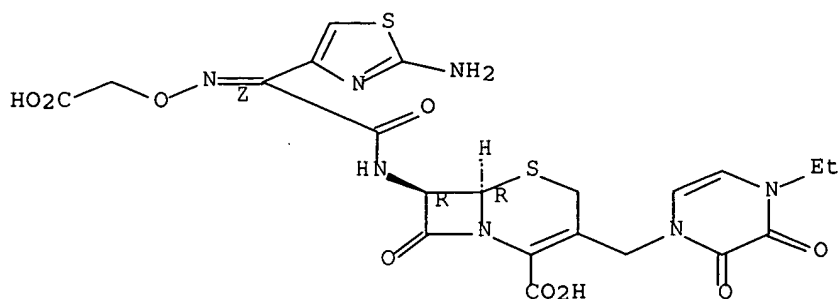
CM 1

CRN 92732-91-7

CMF C21 H21 N7 O9 S2

Absolute stereochemistry.
Double bond geometry as shown.

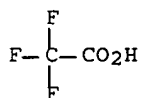




CM 2

CRN 76-05-1

CMF C2 H F3 O2



IT 92732-27-9P

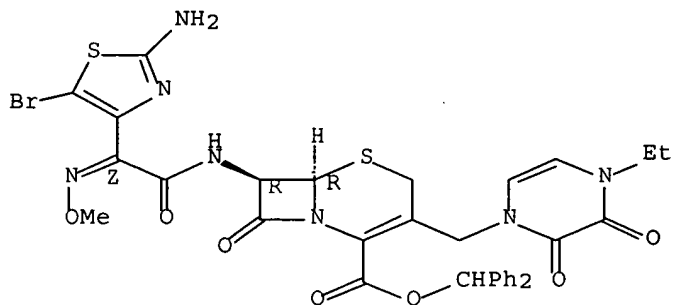
RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)
(preparation and hydrolysis of)

RN 92732-27-9 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-5-bromo-4-thiazolyl) (methoxyimino) acetyl] amino]-3-[(4-ethyl-3,4-dihydro-2,3-dioxo-1(2H)-pyrazinyl)methyl]-8-oxo-, diphenylmethyl
ester, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.



IT 92732-43-9P 92732-93-9P 92732-99-5P

92733-00-1P 92733-01-2P 92733-02-3P

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 92732-43-9 CAPLUS

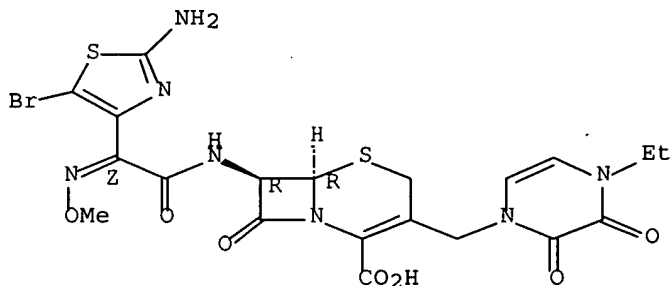
CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
 7-[[[(2-amino-5-bromo-4-thiazolyl) (methoxyimino)acetyl]amino]-3-[(4-ethyl-
 3,4-dihydro-2,3-dioxo-1(2H)-pyrazinyl)methyl]-8-oxo-, [6R-
 [6 α ,7 β (Z)]]-, mono(trifluoroacetate) (9CI) (CA INDEX NAME)

CM 1

CRN 92732-42-8

CMF C20 H20 Br N7 O7 S2

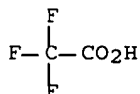
Absolute stereochemistry.
 Double bond geometry as shown.



CM 2

CRN 76-05-1

CMF C2 H F3 O2



RN 92732-93-9 CAPLUS

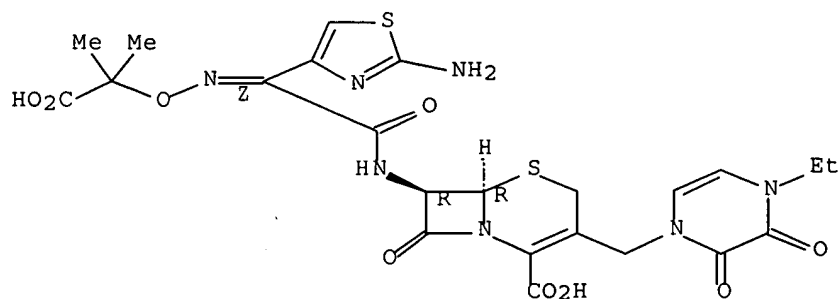
CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
 7-[[[(2-amino-4-thiazolyl) [(1-carboxy-1-methylethoxy) imino]acetyl]amino]-3-
 [(4-ethyl-3,4-dihydro-2,3-dioxo-1(2H)-pyrazinyl)methyl]-8-oxo-,
 [6R-[6 α ,7 β (Z)]]-, mono(trifluoroacetate) (9CI) (CA INDEX NAME)

CM 1

CRN 92732-92-8

CMF C23 H25 N7 O9 S2

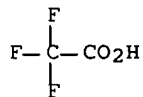
Absolute stereochemistry.
 Double bond geometry as shown.



CM 2

CRN 76-05-1

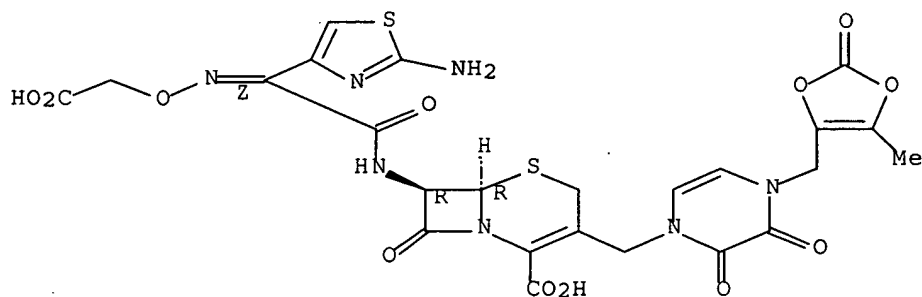
CMF C2 H F3 O2



RN 92732-99-5 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl) [(carboxymethoxy) imino] acetyl] amino]-3-[[3,4-
dihydro-4-[(5-methyl-2-oxo-1,3-dioxol-4-yl)methyl]-2,3-dioxo-1(2H)-
pyrazinyl]methyl]-8-oxo-, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX
NAME)

Absolute stereochemistry.
Double bond geometry as shown.

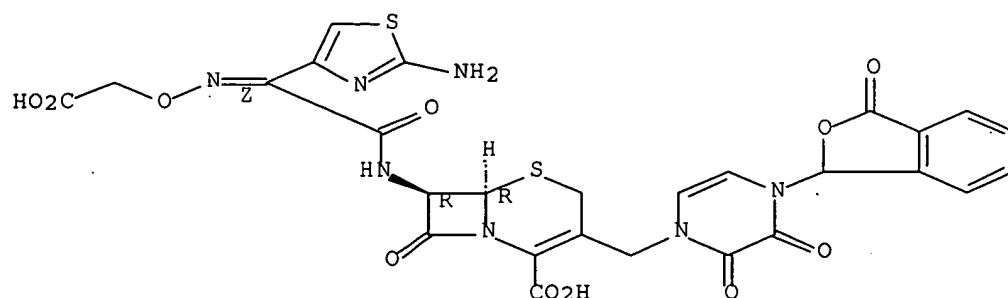


RN 92733-00-1 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl) [(carboxymethoxy) imino] acetyl] amino]-3-[[4-(1,3-
dihydro-3-oxo-1-isobenzofuranyl)-3,4-dihydro-2,3-dioxo-1(2H)-
pyrazinyl]methyl]-8-oxo-, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX
NAME)

Absolute stereochemistry.

Double bond geometry as shown:

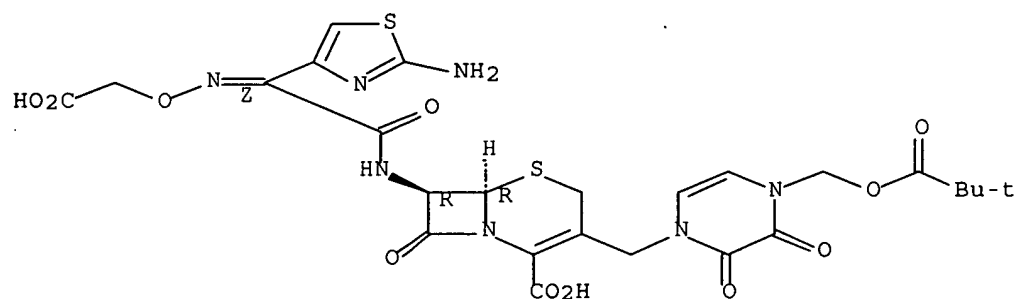


RN 92733-01-2 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-3-[[4-[(2,2-dimethyl-1-oxopropoxy)methyl]-3,4-dihydro-2,3-dioxo-1(2H)-pyrazinyl]methyl]-8-oxo-, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.

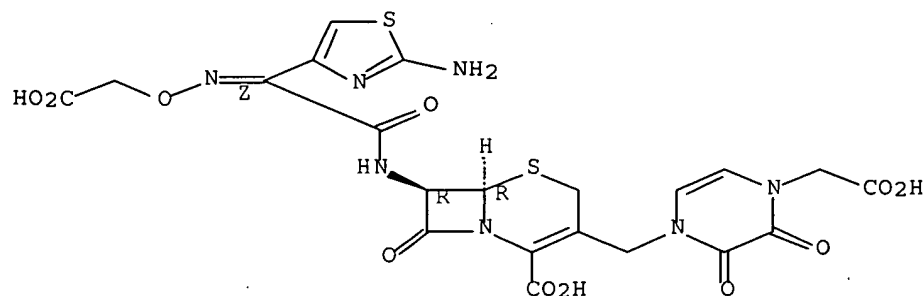


RN 92733-02-3 CAPLUS

CN 5-Thia-1-azabicyclo[4.2.0]oct-2-ene-2-carboxylic acid,
7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-3-[[4-(carboxymethyl)-3,4-dihydro-2,3-dioxo-1(2H)-pyrazinyl]methyl]-8-oxo-, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

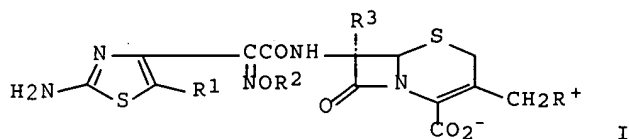
Absolute stereochemistry.

Double bond geometry as shown.



PATENT INFORMATION:

ED Entered STN: 25 Nov 1984
GI



IT 92737-96-7P 92737-97-8P 92737-98-9P
92737-99-0P 92738-17-5P 92738-18-6P

92738-19-7P 92738-20-0P

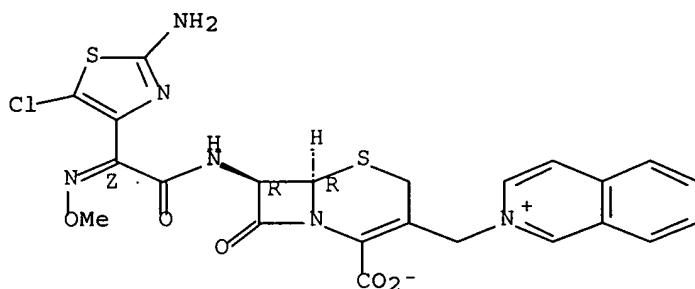
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 92737-96-7 CAPLUS

CN Isoquinolinium, 2-[[7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.

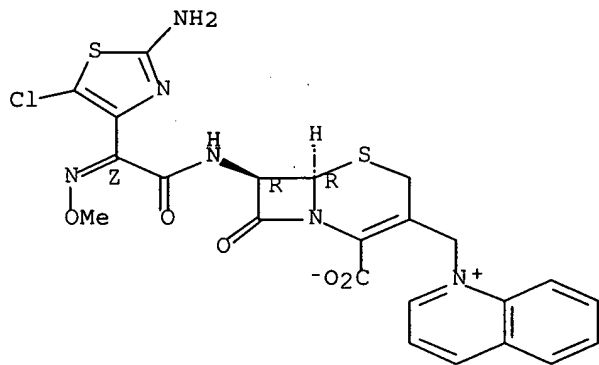


RN 92737-97-8 CAPLUS

CN Quinolinium, 1-[[7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

Double bond geometry as shown.

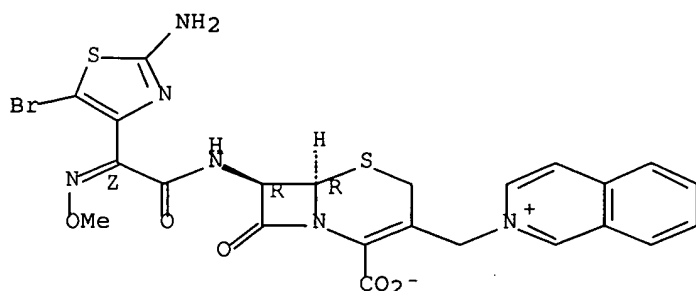


RN 92737-98-9 CAPLUS

CN Isoquinolinium, 2-[[7-[[[(2-amino-5-bromo-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

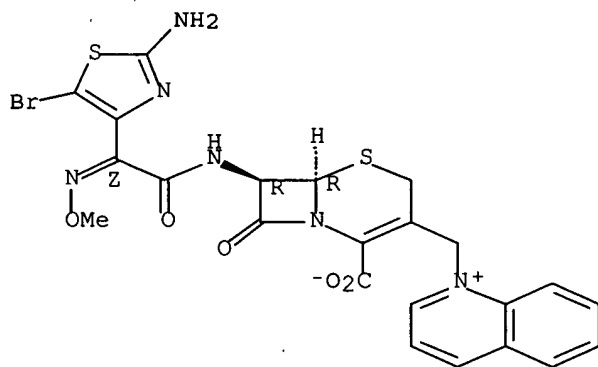
Double bond geometry as shown.



RN 92737-99-0 CAPLUS

CN Quinolinium, 1-[[7-[[[(2-amino-5-bromo-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

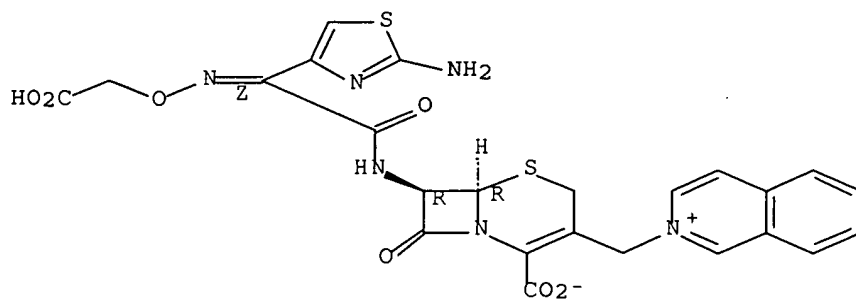
Absolute stereochemistry.
Double bond geometry as shown.



RN 92738-17-5 CAPLUS

CN Isoquinolinium, 2-[[7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

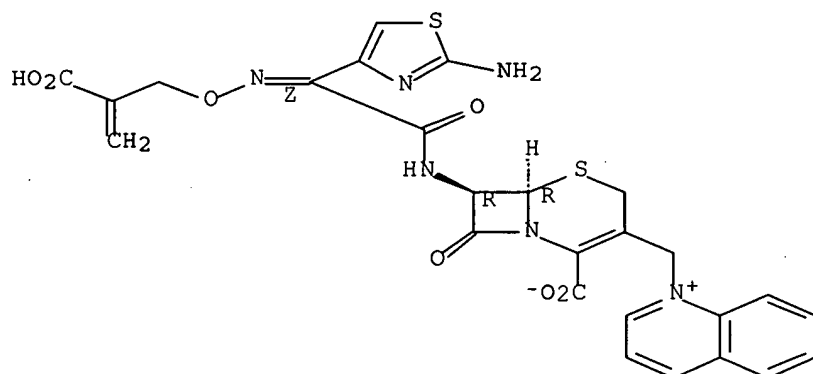
Absolute stereochemistry.
Double bond geometry as shown.



RN 92738-18-6 CAPLUS

CN Quinolinium, 1-[[7-[[[(2-amino-4-thiazolyl)[[(2-carboxy-2-propenyl)oxy]imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

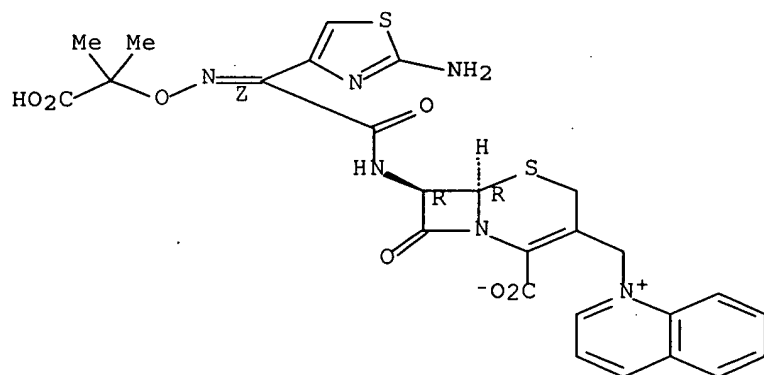
Absolute stereochemistry.
Double bond geometry as shown.



RN 92738-19-7 CAPLUS

CN Quinolinium, 1-[[7-[[[(2-amino-4-thiazolyl)[[(1-carboxy-1-methylethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

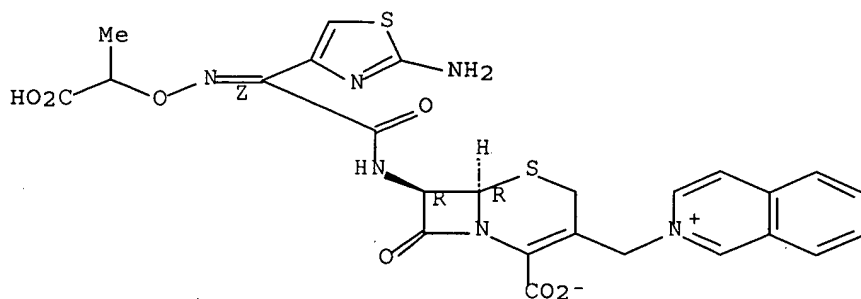
Absolute stereochemistry.
Double bond geometry as shown.



RN 92738-20-0 CAPLUS

CN Isoquinolinium, 2-[[7-[[[(2-amino-4-thiazolyl)[[(1-carboxyethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

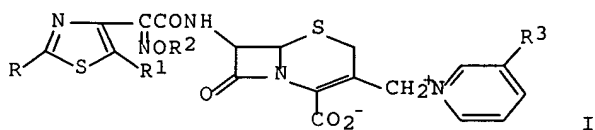
Absolute stereochemistry.
Double bond geometry as shown.



L27 ANSWER 16 OF 16 CAPLUS COPYRIGHT 2006 ACS on STN
 ACCESSION NUMBER: 1983:453475 CAPLUS Full-text
 DOCUMENT NUMBER: 99:53475
 TITLE: Cephem compounds and pharmaceutical antibacterial composition containing them
 INVENTOR(S): Teraji, Tsutomu; Sakane, Kazuo; Goto, Jiro
 PATENT ASSIGNEE(S): Fujisawa Pharmaceutical Co., Ltd. , Japan
 SOURCE: Eur. Pat. Appl., 31 pp.
 CODEN: EPXXDW
 DOCUMENT TYPE: Patent
 LANGUAGE: English
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
EP 74645	A2	19830323	EP 1982-108384	19820911
EP 74645	A3	19840613		
EP 74645	B1	19870408		
R: AT, BE, CH, DE, FR, GB, IT, LI, LU, NL, SE				
JP 58059991	A2	19830409	JP 1982-155754	19820906
JP 03054111	B4	19910819		
US 4550102	A	19851029	US 1982-415910	19820908
			GB 1981-27664	A 19810914

PRIORITY APPLN. INFO.:
 OTHER SOURCE(S): MARPAT 99:53475
 ED Entered STN: 12 May 1984
 GI

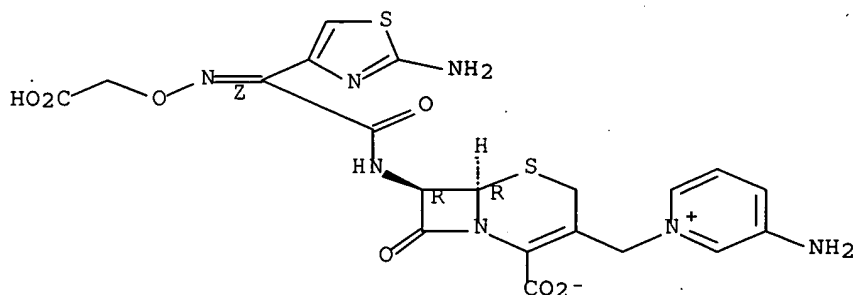


AB Cephems I [R,R3 = (un) protected NH2; R1 = H, halogen; R2 = (un)substituted aliphatic] were prepared Thus, I (R = R3 = NHCHO, R1 = H, R2 = Me) was obtained by treating the acetoxymethyl cephem with 3-formamidopyridine and was deformylated to I (R = R3 = NH2, R1 = H, R2 = Me) which had a min. inhibitory concentration against Escherichia coli of <0.025 mg/mL.

IT 86507-45-1P 86507-49-5P
 RL: SPN (Synthetic preparation); PREP (Preparation)
 (preparation of)

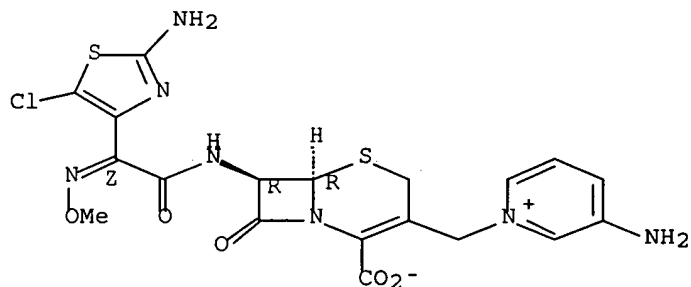
RN 86507-45-1 CAPLUS
 CN Pyridinium, 3-amino-1-[[7-[[[(2-amino-4-thiazolyl)[(carboxymethoxy)imino]acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.
 Double bond geometry as shown.



RN 86507-49-5 CAPLUS
 CN Pyridinium, 3-amino-1-[[7-[[[(2-amino-5-chloro-4-thiazolyl)(methoxyimino)acetyl]amino]-2-carboxy-8-oxo-5-thia-1-azabicyclo[4.2.0]oct-2-en-3-yl]methyl]-, inner salt, [6R-[6 α ,7 β (Z)]]- (9CI) (CA INDEX NAME)

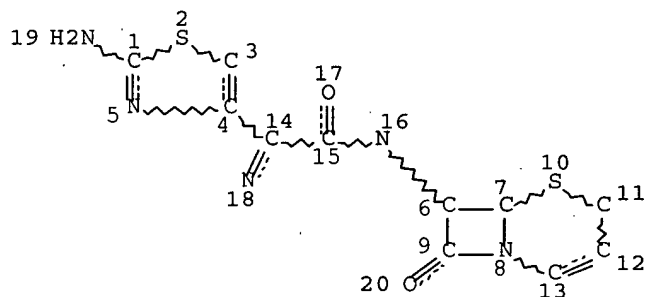
Absolute stereochemistry.
 Double bond geometry as shown.



FILE 'HOME' ENTERED AT 16:06:04 ON 19 OCT 2006

SEARCH HISTORY

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L1 STR



NODE ATTRIBUTES:

DEFAULT MLEVEL IS ATOM

DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:

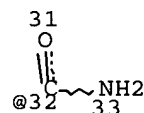
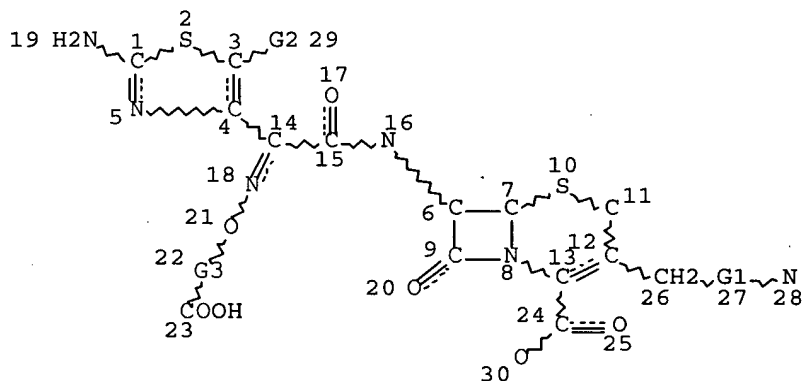
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NUMBER OF NODES IS 20

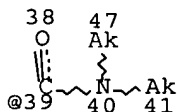
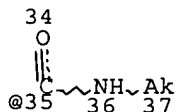
STEREO ATTRIBUTES: NONE

L3 19554 SEA FILE=REGISTRY SSS FUL L1

L6 STR



Ak @46



O~Ak
@42 43

S~Ak
@44 45

REP G1=(0-6) A

VAR G2=X/CN/32/35/39/42/44/46

REP G3=(1-6) C

NODE ATTRIBUTES:

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CONNECT IS E1 RC AT 37

CONNECT IS E1 RC AT 41

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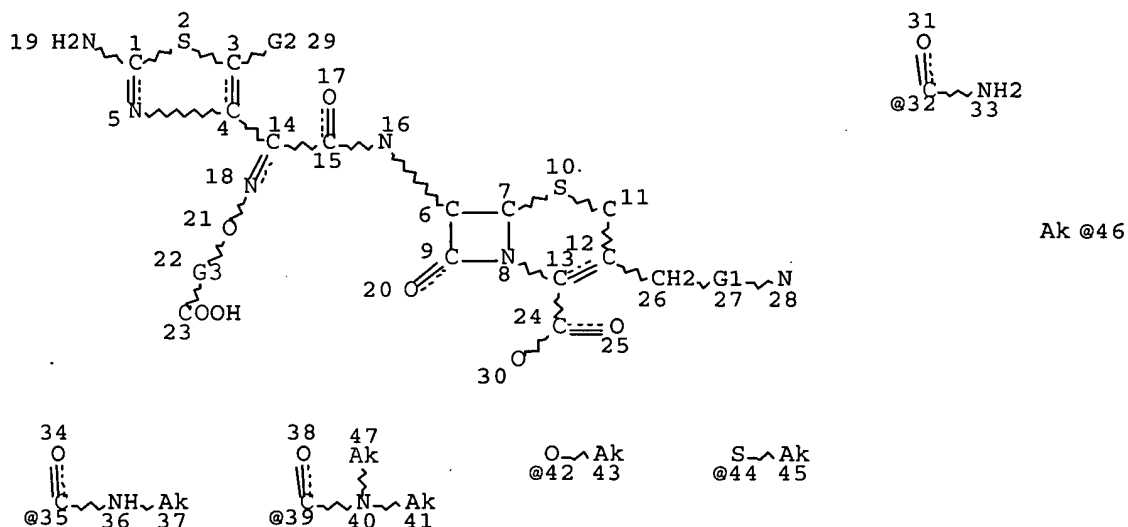
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CONNECT IS E1 RC AT 46

CONNECT IS E1 RC AT 47
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 DEFAULT ECLEVEL IS LIMITED

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 RING(S) ARE ISOLATED OR EMBEDDED
 NUMBER OF NODES IS 47

STEREO ATTRIBUTES: NONE
 L8 STR



REP G1=(0-6) A
 VAR G2=X/CN/32/35/39/42/44/46
 REP G3=(1-6) CH2

NODE ATTRIBUTES:

NSPEC IS R AT 28
 CONNECT IS E1 RC AT 37
 CONNECT IS E1 RC AT 41
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 DEFAULT MLEVEL IS ATOM
 DEFAULT ECLEVEL IS LIMITED

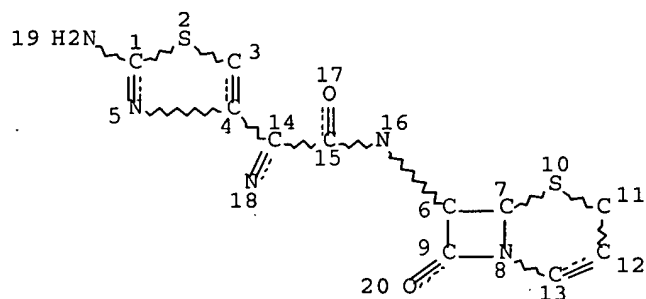
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 RING(S) ARE ISOLATED OR EMBEDDED
 NUMBER OF NODES IS 47

STEREO ATTRIBUTES: NONE
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100.0% PROCESSED 5029 ITERATIONS
 SEARCH TIME: 00.00.01

194 ANSWERS

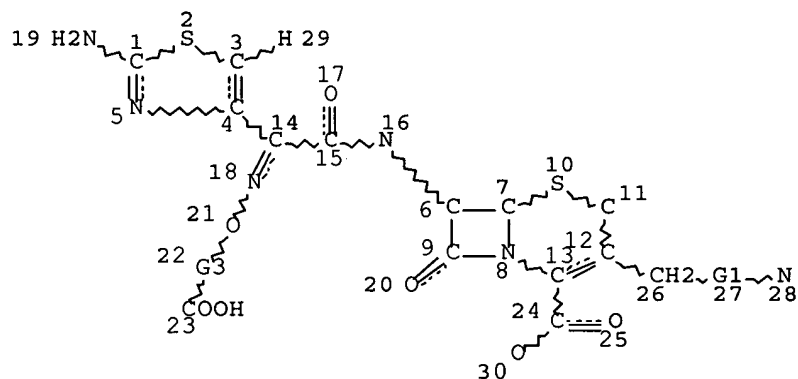
L1 STR



NODE ATTRIBUTES:
 DEFAULT MLEVEL IS ATOM
 DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:
 RING(S) ARE ISOLATED OR EMBEDDED
 NUMBER OF NODES IS 20

STEREO ATTRIBUTES: NONE
 L3 19554 SEA FILE=REGISTRY SSS FUL L1
 L18 STR



REP G1=(0-6) A
 REP G3=(1-6) C
 NODE ATTRIBUTES:
 NSPEC IS R AT 28
 DEFAULT MLEVEL IS ATOM
 DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:
 RING(S) ARE ISOLATED OR EMBEDDED
 NUMBER OF NODES IS 30

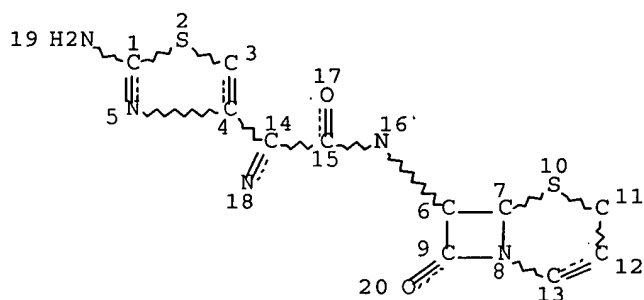
STEREO ATTRIBUTES: NONE
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100.0% PROCESSED 5027 ITERATIONS
 SEARCH TIME: 00.00.01

784 ANSWERS

L1

STR



NODE ATTRIBUTES:

DEFAULT MLEVEL IS ATOM

DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:

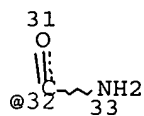
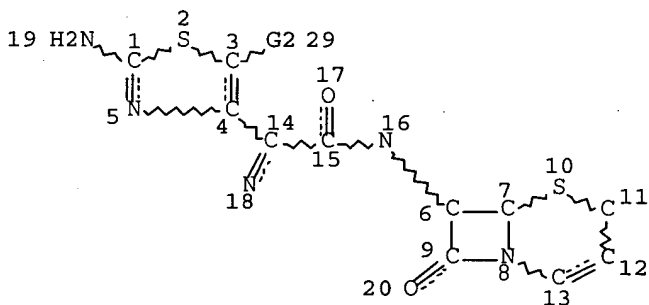
RING(S) ARE ISOLATED OR EMBEDDED

NUMBER OF NODES IS 20

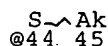
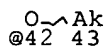
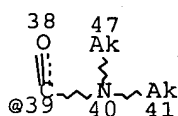
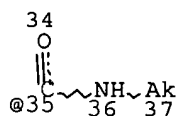
STEREO ATTRIBUTES: NONE

L3 19554 SEA FILE=REGISTRY SSS FUL L1

L19 STR



Ak @46



VAR G2=X/CN/32/35/39/42/44/46

NODE ATTRIBUTES:

CONNECT IS E1 RC AT 37

CONNECT IS E1 RC AT 41

CONNECT IS E1 RC AT 43

CONNECT IS E1 RC AT 45

CONNECT IS E1 RC AT 46

CONNECT IS E1 RC AT 47

DEFAULT MLEVEL IS ATOM

MLEVEL IS CLASS AT 37 41 43 45 46 47

DEFAULT ECLEVEL IS LIMITED

GRAPH ATTRIBUTES:
RING(S) ARE ISOLATED OR EMBEDDED
NUMBER OF NODES IS 38

STEREO ATTRIBUTES: NONE
L23 956 SEA FILE=REGISTRY SUB=L3 SSS FUL L19

100.0% PROCESSED 19554 ITERATIONS
SEARCH TIME: 00.00.01

956 ANSWERS

(FILE 'HOME' ENTERED AT 15:34:08 ON 19 OCT 2006)

FILE 'REGISTRY' ENTERED AT 15:40:43 ON 19 OCT 2006

L1 STR
L2 50 SEA SSS SAM L1
L3 19554 SEA SSS FUL L1
SAVE TEMP L3 BER502FULL/A
L4 STR L1
L5 0 SEA SUB=L3 SSS SAM L4
L6 STR L4
L7 6 SEA SUB=L3 SSS SAM L6
D SCAN
L8 STR L6
L9 6 SEA SUB=L3 SSS SAM (L6 NOT L8)
L10 194 SEA SUB=L3 SSS FUL (L6 NOT L8)
SAVE TEMP L10 BER502SUB1/A

FILE 'CAPLUS' ENTERED AT 15:53:43 ON 19 OCT 2006

L11 7 SEA ABB=ON L10

FILE 'REGISTRY' ENTERED AT 15:53:58 ON 19 OCT 2006

L12 ANALYZE L10 1- LC : 5 TERMS
D

FILE 'STNGUIDE' ENTERED AT 15:55:56 ON 19 OCT 2006

FILE 'CAPLUS' ENTERED AT 15:57:01 ON 19 OCT 2006

E US2004-507502/APPS
L13 296 SEA ABB=ON NISHITANI Y?/AU
L14 417 SEA ABB=ON YAMANO Y?/AU
L15 1 SEA ABB=ON L13 AND L14
D SCAN
D BIB
L16 1 SEA ABB=ON L15 AND L11

FILE 'CAPLUS' ENTERED AT 15:58:42 ON 19 OCT 2006

D QUE NOS L15
D IBIB ED ABS HITSTR L15

FILE 'REGISTRY' ENTERED AT 15:59:14 ON 19 OCT 2006

D STAT QUE L10

FILE 'CAPLUS' ENTERED AT 15:59:20 ON 19 OCT 2006

D QUE NOS L11
L17 6 SEA ABB=ON L11 NOT L15
D IBIB ED ABS HITSTR 1-6

FILE 'REGISTRY' ENTERED AT 15:59:51 ON 19 OCT 2006

L18 STR L6
L19 STR L6
L*** DEL STR L18
L20 37 SEA SUB=L3 SSS SAM L18
L21 784 SEA SUB=L3 SSS FUL L18
SAVE TEMP L21 BER502SUB2/A
L22 40 SEA SUB=L3 SSS SAM L19
L23 956 SEA SUB=L3 SSS FUL L19
SAVE TEMP L23 BER502SUB3/A

FILE 'CAPLUS' ENTERED AT 16:04:29 ON 19 OCT 2006

L24 4998 SEA ABB=ON L21
L25 114 SEA ABB=ON L23
L26 19 SEA ABB=ON L24 AND L25
L27 16 SEA ABB=ON L26 AND PATENT/DT

FILE 'MARPAT' ENTERED AT 16:05:01 ON 19 OCT 2006

FILE 'REGISTRY' ENTERED AT 16:05:39 ON 19 OCT 2006
D STAT QUE L21
D STAT QUE L23

FILE 'CAPLUS' ENTERED AT 16:05:39 ON 19 OCT 2006
D QUE NOS L27
D IBIB ED ABS HITSTR L27 1-16

FILE 'HOME' ENTERED AT 16:06:04 ON 19 OCT 2006
D STAT QUE L10
D STAT QUE L21
D STAT QUE L23

=>

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